Housing Affordability and Rent Regulation

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SUMMARY

One of the most popular justifications for rent regulation is that since housing is a necessity of life, the price of housing must be controlled to make it more affordable, especially in the rental market, which houses most of the country's less affluent households. This paper begins by discussing what we mean by affordability and then surveys some recent evidence of the extent of the affordability problem in Ontario. It is concluded that 15-30 per cent of Ontario households have an affordability problem in that they must spend too much of their income to acquire adequate housing. However, the discussion suggests numerous problems with both the concept and measurement of affordability and concludes that such estimates must be taken as only a crude measure of the extent of the problem.

Assuming that we identify an affordability problem, we must then determine the elements of a policy to address the problem. These elements include, first, the ease with which landlords and tenants know what is expected of them under the policy; second, the incentives for complying with the policy; third, the equity with which the policy can be administered; fourth, the political support for the policy; and, fifth, the distortions in behaviour induced by the policy. Ontario rent regulation exhibits problems in most of these areas: it is not clear what is required of the actors involved, incentives for compliance are weak, and there are numerous unintended effects and incentives for undesirable

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behaviour. This last criticism applies to most rent regulation and is probably less serious in Ontario than in some other jurisdictions. The distortions include reduced incentives for building and maintaining rental housing; "hoarding" of controlled units by existing tenants and higher rent for uncontrolled units, which make them less affordable; a resulting difficulty for households with affordability problems to obtain controlled units; and a questionable distribution of both the cost and the benefit of the policy. Finally, it should be recognized that there is no evidence that rent regulation in Ontario is intended to alleviate housing affordability problems.

The political support for rent regulation requires careful scrutiny. A policy is often adopted because those who stand to benefit from it are better organized and more concentrated than those who will pay for the policy. Similarly, the shape of a policy will tend to be controlled by the best organized among the beneficiaries. Therefore, one must be mindful of the role of policy goals as well as the relative strength of interest groups in determining the form a policy such as rent regulation will take. In this sense, there is certainly no guarantee that rent regulation will be particularly beneficial to needy tenants.

A consideration of alternative policies for increasing the affordability of housing raises the issue of the extent to which such policies should stimulate the demand or supply side of the housing market. In addition, it raises the issue of whether such policies should provide benefits to all households or just to those with an affordability problem and how much discretion beneficiaries should have over the form of their benefit. A survey of evidence relating to a guaranteed income policy, housing vouchers, public housing, and construction subsidies suggests that housing vouchers are a reasonable compromise of a targeted policy

that restricts the form of the benefit to the recipients but provides direct aid to those needing it in a cost-effective way. In comparison, rent regulation provides a more arbitrary distribution of benefits, it may actually aggravate affordability problems, and it is financed primarily by a relatively small group in society rather than by general revenues.

A compromise policy is suggested that provides rent regulation only to households that have affordability problems and compensates landlords for any shortfall between the regulated rent they receive and the fair market rent for a unit. Such a policy avoids many of the problems of rent regulation.

As an accompaniment to such policy comparison, we should determine the extent to which the various Ontario housing markets fail to achieve the competitive ideal of providing housing at the lowest price because of unnecessary government regulation and the non-competitive structure of the various industries that determine the supply of housing.

I. INTRODUCTION

Regardless of the economic system adopted by a society, there is always a tendency for markets to develop for at least some goods in which people trade. Even in ostensibly non-capitalist countries, such as the Soviet Union and China, there are opportunities for "free enterprise" -- the personal agricultural production of the Soviet kolkhoz, the recent rise of small private businesses in China (Wren, 1984), and the black markets that are apparently widespread in both countries. The state intervenes in markets to various degrees and for various reasons. In some systems, the intervention is so extensive that markets -- or anything like them -- are the exception. In others, the operation of markets is the modus operandi of the economy, and government intervention is considerably more limited.[1]

In the latter type of economy, of which Canada is one,[2] government intervention in the economy may result from (1) the pursuit of any of a number of economic goals, such as full employment, economic growth, macroeconomic stability, or a fair distribution of resources (Economic Council of Canada, 1967); (2) market failures such as externalities (costs or benefits of a transaction that accrue to some third party, that is, neither the buyer nor the seller) and natural monopolies; or (3) the influence of special interests that are somehow able either to bring about government intervention that protects them from competition or to avoid intervention that promotes competition.[3] Indeed, some forms of government intervention -- perhaps many -- reflect something of all these motives.

One type of government intervention pervasive in market economies is the regulation of prices, which is based, to varying degrees, on some

notion of fair prices and the influence of the interest groups involved in the regulation.[4] Since the efficient operation of markets does not recognize or allow for the existence of a "fair" price, such regulation is usually considered to be imposed at the expense of the efficiency of the economy (assuming, of course, that the unregulated market is efficient) in exchange for "more" of some other good, or to benefit one interest group at the expense of another seemingly weaker group. Price regulation may take the form either of a price floor (for example, minimum wages and agricultural support prices) below which prices cannot go or of a price ceiling (for example, usury laws and rent regulation). Basically, such regulation -- if it is binding -- results from the idea that some group should be protected from at least one aspect of the marketplace, namely, the market price.

Once one discards the use of market prices (which, in a truly competitive market, are set by no one but result from the self-interested behaviour of many buyers and sellers), then one is implicitly preferring the setting of prices by some individual or organization. Unlike market prices, which are impersonal, regulated prices represent someone's notion of fairness. In the case of rental housing subject to rent regulation or rent control, this notion of fairness is captured by the term "affordability." Rents are regulated (that is, the market price is discarded) because it is believed that housing <u>should</u> be affordable.

Affordability is an old and widespread issue. For example, in its <u>Report</u> in 1935, the Special Parliamentary Committee on Housing stated: "The formation, institution and pursuit of a policy of adequate housing should be accepted as a social responsibility.... There is no apparent prospect of the low rental housing need being met through unaided private

enterprise building for profit...." (Cited in Dennis and Fish, 1972, p. 2.) In 1968, the President's Committee on Urban Housing in the United States concluded: "Federal housing assistance is essential for millions of families unable to afford the market price of standard housing" (p. 1). These are simply different ways of saying that housing should be affordable. At the local level, it is often concluded that, if market prices do not allow this, then they should be regulated until housing is affordable.

The idea of affordability has no apparent philosophic basis.[5] In relation to markets, it means: "To have the means, be able or rich enough to bear the expense" (OED, p. 160). Thus, affordable housing is housing whose expense the buyers can bear. The question, then, is the extent to which housing is not affordable for some buyers. To the extent that it is not affordable, logic might suggest that lowering the cost -- or retarding the rate at which the price rises -- would make housing more affordable. That is the intent of rent regulation.

Closer scrutiny of the concept suggests a number of issues. For example, affordability is subjective: very few of us can afford to live in the mansions of Forest Hill or Westmount. What exactly, then, do we mean by housing? Moreover, one person may be willing to bear the expense of a given dwelling, even if it takes virtually all his or her income. Another may say that he or she cannot afford the same dwelling because it costs "too much," when "too much" may in fact be only a few dollars. Obviously, there is no objective definition of affordability. Therefore, a primary objective of this paper is to discuss the measurement of affordability and the difficulty of identifying the affordability problem in the rental housing market.

The discussion proceeds as follows in accordance with its terms of reference. Section II consists of three parts: a discussion of the concept of affordability; a brief review of evidence on the extent of affordability problems among Ontario tenants; and a discussion of the issues raised in measuring the extent of the affordability problem. Section III considers the most important characteristics of a housing affordability program, with particular attention to the efficacy of rent regulation. Section IV considers four other programs that might be used to address the affordability problem: a guaranteed income, a housing allowance, public housing, and construction subsidies. While it is beyond the scope of this paper to consider all the possibilities -- the literature on housing market policy alternatives and their evaluation is simply too vast -- the discussion does highlight distinct policies that might be considered the most likely alternatives to rent regulation as a means of establishing policy on housing affordability. The discussion also considers the alternative of streamlining the supply side of the housing market and making it more competitive. Section V contains a brief discussion of the costs and secondary effects of rent regulation and alternative policies, and the paper closes with some conclusions suggested by the discussion.[6]

II. AFFORDABILITY: DEFINITIONS AND MEASURES

A. The Concept of Affordability

One can identify an "affordability problem" in virtually any market; it is simply the difficulty buyers have in covering the cost of a given purchase -- usually a major purchase of an essential commodity whose price is either an "unreasonable" share of income or is rising more rapidly than income. The subject of this paper is the affordability of housing, specifically the affordability of rental housing. However, the study will also consider the ownership market to the extent that the two markets interact.

There is no universally accepted definition of affordability. Therefore, several ways of defining the concept will be considered: 1. ratio of shelter costs to income or rent to income; 2. affordability gap; 3. core need; 4. ratio of change in rent to change in income; and 5. distribution of risk.

Rent-to-Income Ratio

The most common indicator of the extent of an affordability problem in a particular housing market is the shelter-income ratio or, in the case of rental housing markets, the rent-to-income ratio. The ratio usually consists of some measure of a household's annual rent divided by its annual gross household income. The limit of affordability has traditionally been 25 per cent of income for housing. Of course, the limitations of a given data set often require modifications in the calculation of the ratio.[7]

Many analysts accept this measure of affordability as the correct one; for example, in their book on housing affordability in the United

States, Feins and Lane (1981) simply assert at the outset that "...the ratio of shelter expenditures to household income is the appropriate indicator [of housing affordability]" (p. 7). The logic of this approach is presumably that income is the best measure of a household's ability to pay for goods and that a household can devote some reasonable proportion of income to housing. Disregarding the question of the adequacy of the housing for a moment, if a household is spending more than the reasonable proportion on housing, then it may have an affordability problem. The group of such households provides a sense of the size of the affordability problem.

The rent-to-income ratio is certainly the most popular, if not the most defensible, measure of affordability. It has been used in scores of studies, perhaps out of convenience and acceptability rather than accuracy. Feins and Lane (1981) set out to determine the analytic basis for the measure but found that it had begun as a rule of thumb that simply stayed with us:

> ... The rule of thumb about family expenditures for shelter was rooted in the common wisdom and experience of the nineteenth century. By the end of the 1930s, it had become well established as a way to describe actual family housing expenses and as a standard for the maximum proportion of income that should be devoted to mortgage payments. Many people recognized that the rule was not an accurate statement of all household budgets, but nevertheless they found it a convenient way to simplify a complex issue. With the passing years, use of the rule spread in the housing field; debate about its suitability continued, but no resolution was reached. (pp. 11-12)

Friedman and Weinberg (1982, p. 11) point out the arbitrariness of the 25 per cent figure: "Despite its common use, the 25% criterion for reasonable rent burdens is essentially arbitrary. Lane (1977) indicates that the figure first arose from the practice in certain mill towns, where workers were charged one week's pay a month for company-supplied housing.

Thereafter, it seems to have become a widely used but unsubstantiated rule of thumb."

Most criticism of the ratio has been in the form of questions that the rule ignores or does not answer. A particularly damaging criticism of the rule is that an assumption that household expenditures on a given commodity should represent a constant share of total household expenditures violates one of the basis premises of true cost-of-living indices, namely, that the share of expenditures that should go to a given commodity to maintain a household's level of well-being should be adjusted to reflect changes in the relative prices of commodities (cf. the discussion of Section II(C) on the failure of the rent-to-income ratio to reflect changes in relative prices).

The Affordability Gap

Miron and Cullingworth (1983) discuss a different measure of affordability, namely, the affordability gap. The gap is measured by comparing a household's income to its non-housing needs according to some widely accepted standard (such as the Social Planning Council of Metropolitan Toronto's Guides for Family Budgeting cited in Miron and Cullingworth, 1983, p. 96). If the income remaining after allowing for non-housing needs is significantly below the household's actual expenditure on housing (for example, by more than $100 a year), then the household is considered to have an affordability problem. Generally, there is an attempt to control for "over-consumption" of housing by imposing some upper limit on household income.[8] One advantage of this approach is that, by using budgets that are usually location-specific, it examines affordability in the context of the local cost of living rather than embracing the 25 per cent rule. Of course, the resulting increase in

accuracy is bought at the price of requiring unusually detailed data, which are costly to collect, or of limiting analysis to places where sufficiently detailed data are readily available.

Miron and Cullingworth (1983) arrive at a related measure of an affordability gap by identifying households with an affordability problem on the basis of a rent-to-income ratio analysis. They then compare these households' actual expenditures on housing to 25 per cent of their household income. The difference is the "annual total gap" between actual housing expenditures and the amount the households could afford, assuming that the limit of affordability is 25 per cent of household income.

Core Need Approach

The core need approach to the analysis of affordability attempts to avoid a weakness of the two preceding approaches, namely, the failure to control for the quality of the dwelling. According to Burke et al. (1981), a core-need household is defined as one that cannot obtain physically adequate housing without spending an excessive proportion of its income to obtain it. This approach identifies two categories of households:

1. those living in physically inadequate or crowded dwellings who are presumed to be unable to afford adequate housing because, given local market conditions, they would have to spend more than 25 percent of their income to do so;
2. those who have adequate housing, but because of local conditions, are forced to spend more than 25 per cent of their income to maintain it.

While this approach does use the 25 per cent rule, it acknowledges that problems of affordability can result either from having to spend too much for adequate housing or from having too little housing when the household spends a reasonable proportion of income -- essentially two sides of the same question.

The advantages of the core need approach are that it takes local housing costs into account and makes some allowance for the amount of housing consumed. Of course, the reliance on existing rents in a locality assumes that such rents are the lowest achievable. For many markets, this assumption may not be correct since housing costs depend upon both the competitiveness of the rental market and the efficiency of housing production (which can be affected, for example, by the extent of unionization among construction workers and such restrictions upon production as local building codes). In addition, as discussed in Section II(C), reliance on the 25 per cent rule may be considered a weakness.

Moreover, the standards of adequacy it applies are necessarily somewhat arbitrary. In fact, quality of housing, broadly defined, is at the heart of the issue of affordability, despite the tendency to think of affordability as dependent upon either a household's income (or wealth) and thus its ability to pay for housing or the production costs for housing. An assessment of the affordability of housing always assumes, at least theoretically, that only housing of some minimum quality is allowable. But if the quality is of the household's own choosing, there may be some suspicion that the household's tastes are too expensive: the household may believe it has an affordability problem, but policy-makers may disagree. The assessment of an affordability problem may also be biased if existing building codes or some other criteria are used to

define the lowest acceptable quality. Although standards are necessary, they are somewhat arbitrary and probably tend to overstate, at least slightly, the amount of housing that households need; thus, standards probably tend to inflate estimates of the extent of the affordability problem, although it is by no means clear that a better measure can be found.

Moreover, as discussed in Section IV, various forms of government involvement in the industry (for example, through regulation of construction unions) may cause housing production costs -- and perhaps quality[9] -- to be higher than necessary, thus aggravating the affordability problem.

The measures just discussed have been used in studies of affordability in various jurisdictions, including Ontario. They are discussed further in the two sections on the measurement of affordability problems in Ontario and the difficulties presented by such measures. The two measures presented in the rest of this section have not been used in empirical studies of affordability, but if they were adopted, it might be possible to gain a more thorough understanding of the extent of affordability problems in the province.

Ratio of Change in Rent to Change in Income

The three measures of affordability just discussed all assess affordability at one point in time. Because such measures provide only "snapshots" of the problem, it has been suggested that policy-makers need some measure of more long-term affordability problems (see Section II(C)). Moreover, affordability does not depend simply on the proportion of income spent on various goods. Given the monetary and non-monetary

costs of finding new housing and moving, it is reasonable to assume that the changes to which a household must adjust may be as important as the amount of money it has to spend.

It would improve our measurement of affordability to relate changes in rents to changes in income. This aspect of the affordability problem has often been overlooked, yet it is central to the issue. We know that the cost of moving retards the adjustment of the rental housing market and that households tend to fall into patterns of expenditure for their various needs. Therefore, it is conceivable that a large increase in rent for a household paying a "reasonable" proportion of its income for rent, even after the increase, may be more disruptive and unaffordable than a small increase for a household spending more than, say, 25 per cent of its income on rent. The threat to affordability when rents rise much faster than income is the psychic cost, which is often large, of re-adjusting one's spending habits (for example for food, clothing, transportation, and entertainment) and perhaps the cost (financial and other) of moving. Thus, it is not unreasonable to argue that a rent increase from 10 to 25 per cent of income presents more of an affordability problem than a rise from 25 to 30 per cent. Yet the former change is not considered an affordability problem but the latter is.

Thus, some measure of changes in rents in relation to changes in income should be used as a complement to the measures of the percentage of household income spent on housing. Two questions are suggested by such a proposal: what is the period over which the changes should be measured; and what measure of changes is appropriate. Although there is no right answer to either question, there are several considerations to keep in mind.

Generally, the longer the period over which a change in burden occurs, the easier it is for a household to adapt to it. This is similar to the idea that long-run demand elasticity is greater than short-run because substitution possibilities are greater over time. Since the income of most households changes at least once a year, it would be possible to measure housing expenditures at least annually. Moreover, most mortgage changes and rent changes for ongoing tenants occur only once a year, while few households have monthly changes in income. Thus, one would want to monitor housing costs and income changes quarterly, semi-annually, or annually, depending upon the availability of data. The longer the period over which changes are measured, the larger the change that can be considered acceptable without posing an affordability problem owing to the greater substitution possibilities.

What changes should be measured? If no other prices were changing, it would be sufficient to compare changes in rent level with changes in income level: if income were adequate to cover higher rents, the affordability problem would not be exacerbated. Usually, however, it would be important to consider the extent to which percentage changes in income were keeping up with percentage changes in rent. If the ratio were greater or less than one, it would indicate that rent was becoming a larger or smaller proportion of income respectively.

Use of this measure of affordability would shift the focus of concern about housing affordability somewhat. For example, policy-makers might have different concerns about a household that has paid 30 per cent of its income for rent over the last five years than about a household whose percentage of income going to housing has risen steadily -- or, even worse, erratically -- over the last five years from 10 to 30 per cent of its income. The former household might be considered to have a

problem with income adequacy, whereas the latter household (assuming its income has not been falling) may be in a market with more volatile housing prices that warrant some form of regulation.

Distribution-of-Risk Approach

Unlike the preceding approaches to affordability, which use empirical analysis to determine the extent of an affordability problem, this approach suggests that affordability is more of a philosophic problem. The other concepts of affordability assume that the problem is simply that the price of adequate housing in a given market consumes too much of the incomes of some portion of the consumers who are willing to or have to live in rental housing. There is, however, at least one other measure of affordability.

The law of real property places the owner of a piece of property higher on a scale of security of property than a tenant. For example, the former has the right to sell the property and to exclude others from using it. Therefore, all tenants as a class are in a less secure position than their landlords and face greater risks. Unless there is some means for tenants to insure themselves against risks, such as rising rents that the owner may impose,[10] they are less protected than owners. This may seem inequitable since tenants also tend to fall disproportionately into the lower income groups, which can least afford such risks (Miron and Cullingworth, 1983, p. 151). The only alternative might seem to be some form of rent insurance like housing vouchers or, if it is more politically acceptable, rent control.

The distribution-of-risk approach sees the affordability problem as an issue of the proper division of rights -- and risks -- between landlord and tenant (and perhaps the public) instead of an inability to

pay. Related to this is the question of security of tenure. A thorough discussion of security of tenure is beyond the scope of this paper, but it is worth noting that shifts in the property rights of landlords and tenants would have a profound effect upon the affordability issue and the housing market.

In general, any shifting of rights from landlord to tenant would tend to make the role of tenant more attractive but the role of landlord less attractive and to lower the value of rental property unless there were some sort of compensatory legislation: landlords would simply have more difficulty using their property as they wished. Therefore, one would expect that any such shift of risk -- for example, protection for tenants against eviction with less than three months' notice, and then only after a hearing -- would need to be accompanied by some form of compensatory scheme so that people would not be dissuaded from being landlords. For example, government might have to provide landlords with some form of rent insurance if it wanted to impose a greater risk upon them.

Another approach consistent with the concept of distribution of risk is that housing should be treated like a public utility (see Miron and Cullingworth, 1983, pp. 81-2). If, as a result of security of tenure, rental housing prices were under perpetual review, owners would be seriously hampered in their ability to maximize the net income from their property and thus to provide signals to other investors regarding the relative value of further investment in rental housing. If prices were regulated in that way, it might be expected that, as in the case of public utilities, returns to owners could never be more than "fair" and rents would neither rise too high nor fall too low. Tenants might prefer

the resulting "fair rents," even if it did mean there would be no bargains, as long as it also meant there would be no rapid or large increases. Of course, the adoption of such a policy might mean that private investors would be less interested in the market since prices and profits would no longer accurately reflect relative profitability. Alternatively, regulators could guarantee investors "fair" returns to investment in rental housing. Ensuring fair rents and ensuring fair returns are not, however, necessarily compatible goals in the absence of some form of occasional -- and perhaps regular -- government subsidization to ensure that revenues were sufficient to satisfy the investors.

One must bear in mind, however, that housing has virtually none of the characteristics of classic public utilities, which are generally natural monopolies. Technically, a natural monopoly exists when a single firm's short-run and long-run average costs are falling over the range of output demanded by consumers at prices that cover marginal costs of production; that is, they exhibit increasing returns to scale of production. Green (1980, pp. 200-205) suggests that such firms exhibit three general characteristics: they are highly capital-intensive (capital/output ratios are three to four times larger than in most manufacturing industries); the distribution of their products requires a capital-intensive, tentacle-like network (such as pipes, wires, or roadbeds); and their output is essential and non-storable, so that output must be readily available but cannot be stockpiled or shipped efficiently over long distances. Except that it is an essential service, the housing industry has none of those characteristics. Therefore, the most compelling reasons for the regulation of traditional public utilities do not exist in the case of housing. However, one could perhaps make a case for housing as a public utility on the basis of one political argument for

TABLE 1

Percentage of All Unsubsidized Renter Households by Rent-to-Income Category in Ontario, 1972-78

Rent-to-income (%) ratio	1972 (%)	1974 (%)	1976 (%)	1978 (%)
Under 5%	3.2	2.6	2.9	3.2
5- 9.9%	9.3	9.6	7.9	11.5
10-14.9%	20.3	20.1	20.7	21.8
15-19.9%	21.7	21.3	19.8	20.3
20-24.9%	13.4	12.4	15.1	12.5
25-29.9%	8.7	7.8	7.4	6.8
30-34.9%	4.4	5.5	5.2	4.5
35% or more	18.2	19.9	20.2	18.9
Households with no income	*	*	*	*
Total URH	100.0	100.0	100.0	100.0

* Fewer than 20,000 households.
SOURCE: Miron and Cullingworth, 1983, Table 7.1, p. 110.

such status: that the industry is "clothed with the public interest" (ibid).

B. Measurement of the Affordability Problem in Ontario

There have been several studies of housing affordability in Ontario in recent years. Some of these studies are summarized in this section; the next section provides a discussion of some of the problems raised by such measures.

Miron and Cullingworth (1983) have estimated rent-to-income ratios from Ontario data. Table 1 reproduces the results of their calculations for every other year during the period 1972-78. On the basis of this analysis and their assumption that the highest reasonable proportion of income to spend on housing is 25 per cent, they find that 30.2 per cent

TABLE 2

Alternative Measures of the Affordability Problem, Ontario Problem Households, 1972-78

	1972	1974	1976	1978
Problem households ('000's)	238	273	297	242
Incidence of problem households (%)	31.3	33.2	32.8	30.2
Total gap ($ millions)	147.4	206.2	274.2	275.7
Average gap per problem household ($)	619	754	924	1139
Gap-to-income per problem household (%)	15.2	17.4	16.9	17.1

SOURCE: Miron and Cullingworth, 1983, Table 7.10, p. 127.

of unsubsidized renter households (URH), or about 242,000 households, had an affordability problem in 1978.[11] They supplement these calculations with measures of the severity of the affordability problem faced by unsubsidized renter households paying more than 25 per cent of their current household income for housing, the so-called "problem households". Table 2 presents information on the gap between the amount such households spent on housing and 25 percent of their household income for 1972-78.

As noted in the previous section, this gap differs somewhat from the affordability gap measured in the Metropolitan Toronto Planning Department study (1980). Consideration of that study allows comparison with some of the results from Miron and Cullingworth. The methodology of the Planning Department's study was to determine how much non-housing expenses would be for various types of households living in Metropolitan Toronto (including an allowance for tax payments). Then, from data on household incomes and average rents for housing (both rental and owner-occupied) that would match the various households' needs, the study

estimated how many households would have too little income left, after meeting their other needs, to pay the estimated housing costs. After allowing for households that receive various other government housing benefits, the Department estimated that, in 1979, about 90,000 households had an affordability problem. Assuming that 40-45 per cent of Ontario's unsubsidized tenants live in Toronto, this figure suggests that 200,000-225,000 households throughout the province may have an affordability problem. This estimate is broadly consistent with Miron's 1978 estimate of 242,000 unsubsidized renter households with an affordability problem (using the 25 per cent criterion) in its suggestion that at least a quarter of Ontario households seemed to have an affordability problem in the late seventies. However, such an extrapolation must be treated with caution since rents as well as incomes are considerably higher in urban areas.

This "budget approach" (Maass, 1980) to measuring affordability allows the analyst to consider what has happened to the costs of other goods and, if data are available, to measure affordability in light of local conditions. The measure still suffers, however, from many of the measurement problems discussed in the next section -- for example, consideration of permanent income, determination of over- and underhousing, and the role played by the preferences of individual households.

A later study of Ontario municipalities that used 1980 data obtained similar results (Ontario Ministry of Municipal Affairs and Housing, 1982a). The findings, summarized in Table 3, show that if the affordability problem threshold is raised from 25 per cent to 30 per cent, the proportion of problem households is reduced by about half. This pattern suggests a greater sensitivity to the choice of an affordability threshold than Miron and Cullingworth's data (see Table 1). To some

extent that may be a result of different time periods or of the different procedures followed in the two studies, which are not necessarily comparable. Nevertheless, given the arbitrariness of the ratio chosen and the secular increase in such ratios over time (Feins and Lane, 1981), these figures point out the difficulty in determining a firm estimate of the extent of the affordability problem.

A recent study for the Commission of Inquiry into Residential Tenancies (Steele and Miron, 1984) improves upon many of the past studies for Ontario by allowing for an affordability threshold that varies by household size. The authors argue that, for any given income, larger households must spend more on other goods and therefore have less to spend on housing; thus, as household size increases, an affordable rent-to-income ratio falls. Steele and Miron chose a set of ratios that reflect both actual rent-to-income relationships among low-income households in Toronto and Winnipeg and "appropriate" ratios suggested by the Metropolitan Toronto Planning Department. They then counted the number of unsubsidized renter households in Ontario with incomes below twice the poverty line (as established by the Statistics Canada low-income cut-off) that had ratios in various years that exceeded the thresholds.[12] The results of their calculations for the period 1976-82 are given in Table 4. As can be seen, their method yields a lower estimate of the number of households with affordability problems in 1976 (the only year for which there are comparable estimates) than Miron and Cullingworth (see Table 2) -- 225,200 compared to 297,000. While one might suspect that part of the difference arises from the income cut-off used by Steele and Miron, all of Miron and Cullingworth's problem households were also poor or near the poverty line. Although they do not specify a twice-the-poverty-line limit, their discussion suggests

TABLE 3

Distribution of Rent-to-Income Ratios, 1980

Municipality	Less than or Equal to 25% (%)	Greater than 25% (%)	Sample Size (#)
Metro Toronto	69.2	30.8	662
Hamilton	71.9	28.1	527
London	65.8	34.2	606
Windsor	67.3	32.7	636
Ottawa	73.5	26.5	582
Thunder Bay	71.2	28.8	633
Sudbury	76.1	23.9	753

NOTE: The proportion of renters paying more than 25% differs substantially across cities.

Municipality	Less than or Equal to 30% (%)	Greater than 30% (%)	Sample Size (#)
Metro Toronto	83.4	16.6	483
Hamilton	85.7	14.3	377
London	81.4	18.6	414
Windsor	82.1	17.9	481
Ottawa	86.5	13.5	459
Thunder Bay	85.7	14.3	449
Sudbury	87.9	12.1	571

NOTE: Sample sizes differ as detailed income was obtained from only approximately 54% of the total sample (all cities). An additional 29% of respondents indicated whether their income was above or below a calculated income representing a 25% rent-to-income ratio.

SOURCE: Ontario Ministry of Municipal Affairs and Housing, 1982a, Table 12, p. 31.

strongly that all their problem households would fall below such a limit (Miron and Cullingworth, 1983, pp. 112-14).

TABLE 4

Number of Households with Affordability Problems, Ontario, 1976-82[a]

	Urban Areas with Population of 100,000 or more				Other Urban Areas and Rural Areas			
	(1968-base poverty line)		(1978-base poverty line)		(1968-base poverty line)		(1978-base poverty line)	
	1976	1980	1980	1982	1976	1980	1980	1982
	('000)		('000)		('000)		('000)	
All renters	182.1	153.4	156.7	122.0	43.1	44.0	44.0	44.8
Renting families	76.7	60.7	60.7	46.6	23.4	19.4	19.4	25.9
Elderly renters	41.6	37.6	39.3	26.4	7.9[b]	8.3[b]	8.3[b]	5.3[b]

a Weighted estimates for unsubsidized renters computed using 1976 Household Income, Facilities and Equipment Micro Data file, 1975 Incomes; 1980 HIFE, 1979 Incomes and 1982 HIFE, 1981 Incomes. Round brackets indicate the estimate is based on 25-49 sample observations. Household income was estimated by projecting forward income given in the HIFE data base on the basis of the increase in average hourly earnings in manufacturing.

An affordability problem is taken to exist if income was below twice the poverty line and if the rent-to-income ratio is > 40% for a one-person household; > 30% for a two-person household; > 25% for a three-person household; > 22.5% for a four-person household; and > 20% for a household with five or more people. A family is defined as any household with head < 65 and with at least one person less than 18. An elderly household is defined as a household with head 65 or older. The poverty line is taken as the Statistics Canada low-income cut-off; "1968 base" refers to the cut-off based on 1968 family expenditure data and "1978 base" to that based on 1978 family expenditure data.

Note that the cut-off is designed for use with family data although it is used here for households.

b "Other urban areas" only.

SOURCE: Steele and Miron, 1984, Table 3, p. 99.

Thus, on the basis of the latest estimates given in Table 4, in 1982 there were about 166,800 households with affordability problems in Ontario. If there are 800,000 to 900,000 unsubsidized renter households

in Ontario (as there were during the seventies), then approximately 19-21 per cent of such households currently have an affordability problem.[13]

The evidence discussed above does not point to a single estimate, or even a narrow range of estimates, of the incidence of housing affordability problems in Ontario in recent years. However, some estimate is required as an indicator of the extent of the problem. Given that the incidence appears to have fallen in recent years and that estimates based on an analysis of rent-to-income ratios seem quite sensitive to the ratio chosen (cf. Table 3), an estimate of an incidence of 15-30 per cent of Ontario households seems appropriate with strong indications from recent data that the lower end of this range is more reasonable.

In addition to concerns expressed earlier regarding the validity of such measures, the next section considers several of the problems encountered in measuring affordability, especially with measures such as the rent-to-income ratio.

C. Measurement Problems

A fundamental difficulty in describing the affordability problem is that of measurement. Ideally, it would be possible to establish for various housing markets a relationship between consumers' incomes and housing prices. To the extent that both the levels and changes in incomes and prices do not reflect an "appropriate" relationship, there is an affordability problem.

What are the problems with an indicator such as the rent-to-income ratio -- the basis for most of the studies discussed previously -- as a measure of affordability? It has already been mentioned that household

size has a bearing on the choice of an appropriate ratio. Other weaknesses of the rent-to-income ratio are:

1. it is essentially arbitrary;
2. it fails to reflect changes in relative prices;
3. it is not easily adjusted for the amount of housing services being consumed and the substitutions available to the household; and
4. it relies on current rather than permanent income and is subject to seasonal and cyclical sensitivity.

Arbitrariness

The choice of a "reasonable" proportion of income to spend on housing -- or an appropriate rent-to-income ratio -- is always somewhat arbitrary; analysis involving such ratios requires consideration of a range of values in order to determine how sensitive the size of the affordability problem is to the choice of ratio. However, as is the case with the Ontario data presented in Tables 1 and 3 and discussed above, such analyses simply point out the arbitrariness involved in selecting a "proper" ratio. The concern is that those who want to find a problem will choose a low ratio: if, in light of Table 1, 20 per cent is chosen, then the proportion of households with an affordability problem in 1978 jumps to 42.7 per cent. Similarly those who do not want to find a problem will choose a high ratio: if 35 per cent is chosen, then only 18.9 per cent of households have a problem. Thus it can be seen that there is no right answer to the question of what the right ratio is.

Some have argued that 25 per cent has been established for many years and therefore is the most acceptable ratio. However, this argument actually belies the validity of this figure because the ratio ignores

the relative scarcities in the market, which change considerably over time.

Failure to Reflect Relative Prices

In the post-war period, most lenders, real estate brokers, and governments have assumed that the maximum fair proportion of income be spent on housing is 25 per cent (Burke et al., p. 7). The U.S. government accepts this figure in determining eligibility for various federal programs, and the Canadian government uses it in determining eligibility for non-profit and co-operative housing assistance.

However, one must wonder whether this widespread acceptance is more a result of convenience than validity. What we care about in examining how well a community's households are housed is, more fundamentally, whether the households are becoming better off generally over time. A rent-to-income ratio analysis may not answer that question because such ratios consider affordability conditions in only one part of the market. For example, if prices for all other goods as a group are falling or if they are rising slowly enough in relation to incomes and housing prices that households are just as well off over time -- or perhaps even better off -- despite the possibility of a rising rent-to-income ratio, then it is difficult to conclude that there is an affordability problem. Yet the large number of studies of rent-to-income ratios do not explore this essential aspect of the problem.[14]

To understand the problem, suppose that ten years ago a household earned $1,000 a month, of which $250 was spent on housing and $750 on all other goods. By 1984, the monthly income for the household rose to $2,000, but the same "bundle" of all other goods could still be bought for $750. The household could now spend up to $1,250 a month on housing

-- 62.5 per cent of income -- and still be just as well off as, or better off than, it was ten years ago. But if it did spend this amount, then a rent-to-income analysis would reveal that the household developed a severe housing affordability problem, although it would be consuming the same bundle of market goods it has always consumed, or more. Indeed, the bundle of all other goods could become more expensive -- say, $1,300 -- but the affordability of housing would still be a problem as long as more than $500 a month was going to housing.

In this example, the rising share of income spent on housing may represent a significantly increased consumption of housing services -- in which case the household is presumably much better off (that is, if housing prices have not changed at all). To the extent that the greater housing expenditures simply reflect rising prices, then we may not be happy that housing suppliers may be getting larger incomes, but the household is still no worse off. The problem here is more one of distribution than one of the household becoming worse off, and it is difficult to envisage any increased affordability problem as long as the household is consuming as much as it consumed in the past (and it may be consuming more).

Although the example exaggerates the changes in relative prices over time, it demonstrates the fact that, if the prices of various goods are not rising equally rapidly, then prices, incomes, and price-to-income ratios may rise even though there is no large or growing affordability problem. Indeed, the widespread evidence of rising rent-to-income ratios over longer periods of time (Feins and Lane, 1981, pp. 30-42) may be proof of just such a phenomenon, although many of the available studies do not give a very clear picture of the problem.

A related point is that the proportion of income that a household spends upon housing is closely related to the elasticity of its demand for housing, which is a function of the household's preferences. For example, a household with a strong attachment to a particular unit of housing and a particular neighbourhood may voluntarily pay large rent increases in order to stay there, even though alternatives in the market would allow it to maintain or even reduce its customary rent-to-income ratio. Does such a household have an affordability problem if its ratio moves from 25 to 30 per cent? To 40 per cent? A firm attachment to a given neighbourhood may be particularly prevalent among older people who have lived in an area for many years; not surprisingly, such households are considered to have a high incidence of affordability problems (Miron and Cullingworth, 1983, pp. 116-19). But is this truly an affordability problem?

In addition, an increase in the <u>average</u> rent-to-income ratio may simply mean that higher-income renters have been buying homes (Stegman, 1982). This movement would also be expected to shift upward the <u>proportion</u> of renters who are paying more than some chosen percentage of income for rent. Moreover, such a migration to the ownership market could be expected to accompany rent regulation if the price of uncontrolled units rose enough to lower the relative price of owned housing.

A related question is: how does affordability vary by location? This question has not received much attention, and yet it is crucial. Indeed, this may be one of the primary reasons for the different degrees of political support for rent regulation in various Ontario constituencies. For example, the prices of non-housing commodities may rise (or fall) more quickly than housing in some parts of the province and

more slowly in other parts; in other words, the relative prices of housing and non-housing commodities may vary greatly by location. For example, it may be entirely insufficient to have 70 per cent of median household income left for all other commodities in Toronto, but it may be quite adequate to have that proportion or even less of perhaps a much smaller income in an area with a significantly lower cost of living.

The widely divergent vacancy rates in various parts of Ontario support the idea that the affordability problem differs widely across the province. In 1976, for example, the vacancy rate was 3.8 per cent in Hamilton and 0.2 per cent in Thunder Bay; in 1982, the corresponding rates were virtually identical at 0.6 and 0.5 per cent respectively while London's had more than doubled over the period, rising from 1.5 per cent to 3.2 per cent (Ontario Ministry of Municipal Affairs and Housing, 1983, p. 25).[15] Attitudinal surveys also support this idea: during 1980, 14.4 per cent of renters who moved in Thunder Bay cited affordability as a reason for moving, whereas 8.5 per cent of movers in London cited this reason (Ontario Ministry of Municipal Affairs and Housing, 1982c, p. 11). Ironically, Table 3 shows that London has the more serious affordability problem as measured by rent-to-income analysis. Yet provincial rent regulations are, of course, province-wide.

Finally, the limited data available on rents and incomes by location reveal large locational differences (see Table 5). For example, during 1981, almost 27 per cent of lower-income non-moving households in Toronto had rent increases of more than 10 per cent and about half that proportion of higher-income households faced similar increases. The proportion of households with no increase was well below 20 per cent. In Windsor, on the other hand, about half the households had no increase,

and the proportion of households -- higher- and lower-income -- with increases of 10 per cent and more was close to 10 per cent or less. All those differences occurred in spite of province-wide rent regulation.

Failure to Adjust for Quantity Consumed and Substitutions Available

Another fundamental problem with any measurement of affordability arises when we try to adjust our estimate of problem households for the amount of housing they consume. That is, a high rent-to-income ratio could simply reflect a household's consumption of more housing than it needs. In order to assess the extent to which households have chosen to be over-housed, it should be recalled that housing consists of a number of features that are produced and purchased as a package. Aside from the usual components of housing, such as number of bedrooms, square feet, number and content of bathrooms, housing also includes such features as location in relation to the buyer's work, or friends, or favourite shopping areas; the quality of the neighbourhood; degree of privacy; and proximity of various types of transportation. To determine over- or under-housing, we need to consider the household's consumption of each of these housing characteristics as compared to some "adequate" level.

In order to decide how to trade off these various components of housing, we need to denominate their value by some common measure such as dollars. This, in turn, suggests the need for hedonic price indices[16] for the various types of housing in various markets so that one can decide that a household with an extra bedroom (valued at, say $100 a month in a given market) is no more over-housed than a household without an extra bedroom but with the use of a sauna (at $50 per month), which is

TABLE 5

Percentage Rent Increase (Non-Movers) by Annual Household Income, October, 1980 - October, 1981

Municipality	Annual Household Income	Zero and Less (%)	0.1 -10 (%)	10.1 -20 (%)	over 20 (%)	Total (%)	Sample Size
Metro Toronto	Less than $20,000	17.2	55.9	20.0	6.9	100	145
	$20,000 and over	13.0	72.2	11.1	3.7	100	216
Hamilton	Less than $20,000	24.7	57.5	14.8	3.0	100	101
	$20,000 and over	22.8	61.4	12.6	3.2	100	127
London	Less than $20,000	24.5	64.3	9.1	2.1	100	143
	$20,000 and over	22.5	66.0	7.9	3.6	100	138
Windsor	Less than $20,000	49.6	43.6	4.3	2.5	100	117
	$20,000 and over	54.3	35.4	7.5	2.8	100	107
Ottawa	Less than $20,000	20.1	65.8	7.4	6.7	100	134
	$20,000 and over	20.6	63.0	13.5	2.9	100	170
Thunder Bay	Less than $20,000	35.3	51.6	11.5	1.6	100	122
	$20,000 and over	43.8	45.1	9.7	1.4	100	144
Sudbury	Less than $20,000	39.8	41.5	12.5	6.2	100	176
	$20,000 and over	27.5	46.2	21.6	4.7	100	171

SOURCE: Compiled from Rental Market Survey in Seven Ontario Cities (October, 1981) (Ontario Ministry of Municipal Affairs and Housing, 1982c, p. 19).

not considered necessary, and that is two miles closer than "necessary" to the city centre (at $25 a mile per month).[17]

Although it requires some statistical analysis to arrive at prices for the various components of housing, such prices can be estimated. One study of rental housing in Vancouver (Marks, 1984) discovered, for example, that in 1978, an additional bedroom increased the monthly rent of a standardized unit of housing by about $49.31 in the controlled sector and $38.60 in the uncontrolled sector. Living on the west side of the city rather than the east side was estimated to have no value in the

controlled sector and to be worth $46.58 a month in the uncontrolled sector.[18] If it were possible to specify the composition of adequate housing, then, using an hedonic index, the proportion of a household's rent devoted to over-housing could be determined. Even if a household had inadequate levels of some component (for example, bedrooms), it would be possible to determine if there were some other component being purchased in "excessive" amounts that could, if the household desired, presumably be traded for larger quantities of the deficient component (probably by moving).

Unfortunately, the attempts to adjust rent-to-income ratios for over- and underhousing have not been very successful because of either inadequate data or too narrow a definition of "housing". For example, Miron and Cullingworth (1983) use the number of bedrooms to determine the extent to which households of various sizes that pay 25 per cent of their income or more for housing are over- or underhoused. Their approach was also adopted by the Ontario Ministry of Municipal Affairs and Housing in its analysis of affordability (1983). But such an analysis overlooks all the other ways in which a household may have too much or too little housing as well as the many substitutions available to households when they choose a dwelling. Households with an extra bedroom may not be over-housed if they have one bathroom for seven people or if they must drive 30 miles each way to work. Similarly, households with one bedroom too few may not be underhoused if they have an extraordinary amount of floorspace or they live on the top floor of a downtown highrise. For example, the study of the Vancouver housing market found that an extra bedroom was worth about four miles' proximity to the city centre in the

uncontrolled sector; and that living one storey higher was worth accepting an apartment about four years older in the controlled sector.

The difficulty of adjusting such measures as rent-to-income ratios for such trade-offs further weakens their usefulness as a means of identifying an affordability problem.

Another adjustment made by some studies is to examine households that spend more than 25 per cent of their incomes on housing and live in "inadequate" housing; that is, the unit lacks certain amenities, such as indoor plumbing, heat, and refrigeration. However, few dwellings in Ontario lack these amenities: in 1979, 99.6 per cent of dwellings had running water, 99.3 per cent had a bath or shower, 99.1 per cent had flush toilets, and 99.6 per cent had refrigeration (Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 112). Therefore, these studies have had to rely on rooms per person, which, as has been suggested, is a very imperfect measure.

Reliance upon Measures of Current Income

The failure of the ratios described above to reflect the ways that households adjust their consumption in response to relative prices suggests another weakness of such ratios, namely, that they rely upon measures of current income. For a number of reasons, a household's pattern of consumption may be much less volatile than its income, which may fluctuate for seasonal and cyclical reasons as well as because of changes in tastes. Housing consumption tends to be stable owing to the pecuniary and non-pecuniary costs of moving as well as search costs of finding new accommodation. Yet virtually all studies of rent-to-income ratios use current or last year's income.[19] Thus, any identification of "problem households" will include a number of households whose income is low

temporarily, owing, for example, to temporary unemployment. Similarly, some households with a transitorily high income will be erroneously excluded from the count of problem households. Unfortunately there is no guarantee that the two measurement errors offset each other.

The same issue arises, not surprisingly, in measuring the extent of poverty. A comprehensive analysis of the incidence of poverty in the United States as measured by current or permanent income yielded important findings in this regard. In an analysis of household incomes over a six-year period, it was found that 25 per cent of households with no more than a poverty level of current income were above the poverty line in all the other five years, and another 30 per cent were above the poverty line in three of the other five years. The other 45 per cent of households remained in poverty throughout the period, although there were large shifts in income (F. Levy (1976) cited in Struyk et al., 1978, p. 38). Thus, a measure of overall ability to pay based on current income apparently includes many households with no permanent problem -- and may, in fact, exclude many households that are in greater need.

Many would argue that only those households that are permanently in need should be the recipients of aid as long as there is no means of recovering benefits paid to those that are only temporarily poor. A large proportion of currently poor households would then become ineligible for benefits. The existing systems of income security are more generous than this since they provide benefits to match current need. Thus, some permanently non-poor households get aid temporarily. However, policies aimed at making housing more affordable, such as rent regulation, present a new and more serious problem in that they may provide <u>permanent</u> or long-term benefit based only on current need (or

perhaps no need at all, since there is no assurance that all, or even most, tenants have an affordability problem).[20]

The issue of matching need with access to benefits is essentially the following: if government policies are to address people's inability to afford housing, we must identify the right households. Moreover, unless we can turn the policy on and off quickly, we need some measure of ability to pay that is consistent with the duration of the benefits. For example, in the first year, rent regulation policy might reduce by 50 per cent the number of households that spend more than 25 per cent of their income for housing. However, if a large proportion of those households were temporarily poor (for example, they were on extended temporary layoff from a local plant), then the benefit they received from reduced rent in subsequent years cannot be said to be alleviating an affordability problem. For that reason any effective measure of affordability must incorporate long-term ability to pay, especially if the resulting programs tend to confer long-term benefits.

The distinction between transitory and permanent income and the related ability-to-pay differentials have been recognized in other areas. For example, ability to pay is the basis of the Canadian income tax system (Auld and Miller, 1982, pp. 80-81). Indeed, the tax system has periodically attempted to collect taxes on permanent rather than transitory income through general income averaging and income-averaging annuities. The principle is essentially the one suggested here for the analysis of housing affordability: affordability or ability to pay -- taxes or housing costs -- should be based on permanent income.

Admittedly, it is not easy to measure permanent income, and, in fact, current income may provide a better measure of the cash available for rent, although the existence of savings or the ability to borrow,

which reflect permanent income, obviate this argument. What is being suggested here is simply that basing the analysis of affordability upon a measure like average household income over some number of years would provide a more reliable estimate of the extent of the affordability problem. (This of course would require longitudinal data on individual households.) Indeed, average income over recent years is probably a better measure than any estimate of lifetime average income because consumption, savings, and borrowing are probably determined more by the current stage of a household's life cycle than by its lifetime income. Analysis using such measures has been performed in other related areas such as household response to both housing allowances (Friedman and Weinberg, 1982) and changes in tax policy (Okun, 1971).

Affordability also varies over the business cycle and over the year. In addition to being affected by the accounting period problem, whose focus is upon the household's short-run and long-run ability to pay, housing affordability is also affected by trends in the price of a particular commodity. How do we know that the rent-to-income ratio at a given time does not reflect simply a transitorily low income and seasonally or cyclically high rents (for example, in September in a university town or in spring and summer in a tourist area)?

This critique of the measurement and analysis of affordability suggests that little is known about the extent to which affordability is a problem and that to get a better idea would be expensive and time-consuming, owing not only to the data collection problems but also to the problems with the concept of affordability itself.

Steps to improve measures used to assess affordability would include the following:

1. use of a measure of permanent rather than transitory household income, which would porobably mean income averaged over several years;
2. determination of affordability problems on a market-by-market basis;
3. determination of the extent to which households have too much or too little housing, including consideration of available trade-offs that would allow components being overconsumed to be reduced in order to increase amounts of components being underconsumed (the paternalistic nature of the determination of such trade-offs may be troublesome here; furthermore, it may be very difficult to measure adequacy: what is "adequate" proximity to jobs and friends?); and
4. in light of 3, accurate measurement of how much housing households consume, so that overconsumption (at least for major components such as number of rooms, floor space, and location) can be determined.

The affordability issue is also complicated by circumstances that are determined simultaneously with a household's ability to afford housing. That is, it may be possible first to identify a household having an affordability problem at a specific time but then fail to consider various adjustments that a household may make to alleviate or remove the problem. For example, a household could reduce its over-consumption of non-housing goods in order to spend more on housing. In the household's trade-off between time spent working and time off, a rise in the price of purchased commodities (of which housing is one of the most important) reduces the purchasing power of earnings and thereby tends to induce greater labour supply and presumably more household income. On the other hand, the substitution effect of the price rise (that is, the tendency to consume fewer goods or groups of goods that

become relatively more expensive) makes time off more attractive relative to purchased commodities so that it is impossible to predict accurately the extent to which household income may rise to meet expenses. This will also be affected by local labour market conditions, of course.

An affordability problem in the rental housing market may also induce the household to move into the ownership market, where affordability may be less of a problem. In that sense, a household's "choice of market" is endogenous; that is, it is co-determined with the household's ability to afford rental housing. Finally, the nature of the household may be affected by affordability conditions (Miron and Cullingworth, 1983, pp. 91-93). For example, if a number of young adults are having difficulty affording their one-bedroom apartments, they may jointly rent a large house, with the result that the rent per person falls. Thus four one-person households with affordability problems become one household with no affordability problem -- without any government intervention. Miron (1979) has pointed out that such endogeneity is most common among non-family households and children of home-leaving age. However, none of the affordability measures discussed allow for such adjustments as these.

Finally, it should be recognized that the housing affordability problem and its measurement are as much related to income as to the price of housing. For example, studies of rent-to-income ratios may underestimate the affordability problem because households spending 25 per cent or less on adequate housing may be spending too little on all other goods, and, if they spent enough on other goods, they would have too little to spend on housing. In other words, this measure of affordability may be simply ignoring affordability problems in such other areas as food, clothing, child care, and transportation. However,

TABLE 6

Percentage of Households by Rent-to-Income Category by Revised Low Income Cut-off Status: Ontario Unsubsidized Renter Households, 1972 to 1978

Rent-to-Income (%)	1972 (%)	1974 (%)	1976 (%)	1978 (%)
Less than 25%				
Below cut-off	2.7	*	3.4	*
Above cut-off	65.1	63.8	63.0	67.4
25% or more				
Below cut-off	15.7	17.3	17.1	15.5
Above cut-off	15.6	16.0	15.7	14.6
No income	*	*	*	*
All URH	100.0	100.0	100.0	100.0

* Indicates fewer than 20,000 households in category.

SOURCE: Miron and Cullingworth, 1983, Table 7.2.

households with such expenditure patterns are not included in the estimates of the number of households with affordability problems.

An ideal measure of affordability would reflect a household's overall satisfaction. That is, since households may be better off even though they are paying a rising proportion of income -- even permanent income -- for rent, we would like to look primarily at households that are being made worse off. This effort would involve a broader consideration of affordability not limited to housing, and, thus, it would consider income adequacy rather than simply affordability problems in the housing market. It is worth noting that this may be the more important issue for governments to address.

In this regard, data from Miron and Cullingworth (1983) are enlightening. Miron and Cullingworth's study, which is one of the most careful analyses of rent-to-income ratios in Ontario, addressed some of

the problems mentioned above in examining the relationship between rent-to-income ratios and income levels. Their results show that, during 1972-78, about half of the households with an affordability problem (that is, with a ratio greater than or equal to 25 per cent) also had incomes below one measure of the poverty line (Statistics Canada's Revised Low Income Cut-off), so that they have a general affordability problem (see Table 6). As Miron and Cullingworth show, however, the income levels of the other half of households paying 25 per cent or more is not much higher: virtually all had incomes below $15,000 in 1978.[21] Thus, the affordability problem as identified by rent-to-income ratio analysis is closely related to poverty.

III. CHARACTERISTICS OF A HOUSING AFFORDABILITY POLICY

A. General

The previous section examined the measurement of affordability and the extent to which we can determine which and how many households have an affordability problem. The conclusion is that measurement of the extent of the affordability problem requires much more information and analysis than has so far been available and that we have usable but not very good measures of the true extent of the problem in Ontario.

Having examined the prior issue of identifying and measuring the extent of the housing affordability problem, we are now in a position to consider the rext issue, namely, the characteristics of an effective policy for addressing that problem. With such a measurement, the following elements must be considered:22

1. the clarity and specificity of the law or regulations and various users' knowledge of the law;
2. the administrative feasibility and cost of the program, with particular emphasis on the problems of enforcement;
3. the equity of the program and the extent to which it will benefit or harm various groups in the community;
4. the permanence of the program; the extent to which funding and political support are dependable and benefits and costs are concentrated or diffused; and the ease with which the policy can be changed or repealed;
5. the extent to which the policy distorts market incentives or provides incentives for "undesirable" behaviour; and
6. the penalties imposed for non-compliance.

Little needs to be said about the first point because interpretation of laws or regulations are problems for the judicial system. "What the law means" is a problem that can be addressed but never "solved." Perhaps the only point to emphasize is that one must be aware of political motives for vagueness. That is, one way to appear to be "doing something" is to pass a law or promulgate regulations that are so vague as to be unenforceable or unconstitutional.

The question of compliance presents the problem of whether the law and its administration are such that a rational citizen (in this case the landlord or tenant) has an incentive to comply.[23] The issue faced by the citizen -- for example, the landlord -- is: what are the costs of compliance with rent regulation compared to the costs of noncompliance? The cost of compliance in a simple model of the world is lower rents. And, in the absence of feelings of guilt, the cost of non-compliance is legal costs plus the penalty charged for non-compliance times the probability of getting caught and convicted -- that is, the expected value of the penalty. Depending upon the number of administrative steps necessary to obtain a conviction, the expected value may be small. For example, a reasonable progression of events might involve the following:

1. getting caught not complying;
2. being convicted of not complying; and
3. losing an appeal of a conviction.

If, for each of the steps, the chances of finding in favour of the landlord are fifty-fifty and the outcomes are independent of each other, then the probability of the landlord ever paying the penalty (for example, $1,000 per conviction) is one in eight, or .125, and the expected cost of non-compliance is $125 (plus legal costs). Since, in the absence of conviction, higher rents are collected with a probability

of one, it is apparent that enforcement must be strict enough and penalties high enough to ensure compliance -- if the regulations are to operate as they are written.

It is also important that a law be applied equitably. Uneven application, especially with regard to whole groups within a community, not only violates our sense of fairness but also weakens respect for the law. For example, various forms of prejudice may cause local ordinances to be enforced much more strictly against some groups than others. To take another example, minimum wage laws that force employers to pay above-market wages may make it more difficult for minority group members to find employment because employers select the most "desirable" candidates. This phenomenon is related to the incentive for undesirable behaviour discussed below.

The effectiveness of a policy also depends on its permanence and the basis for its support. Frequent and broad changes in policy suggest political instability and a risky environment, thus dampening people's reliance upon a policy; in the case of economic regulation, it can discourage market activity (for example, investment). Moreover, policies may be implemented simply because the parties that stand to gain are better organized and better able to influence the legislators than the parties that stand to lose. The extent to which a policy serves the general public interest may be -- and often is -- irrelevant, especially when the costs of a policy to any given voter are too small to warrant effective opposition even though the sum of the costs yields large benefits to a smaller group.[24] Policies that yield large benefits to each member of a small group by imposing a small cost upon the members of a much larger group (for example, the rest of society) and that lack

broad-based political support can engender cynicism about the political process and the democratic system as well as concern about the fairness of the distribution of political influence in the society.

Any form of intervention in the market that changes the costs of, or benefits from, particular behaviour will probably influence that behaviour. Regulation may distort the market incentives that promote efficiency. For example, if professional societies are given too much power over the number of practitioners they license, we may face a shortage of such practitioners, resulting in a price for their services that is above competitive levels. Well-qualified new entrants face barriers to entry because their presence would lower the price to the consumer and result in lower profits for the existing practitioners.

Similarly, government regulation may induce undesirable behaviour. The subsidy implicit in the Crow's Nest Pass Rate -- a below-market freight rate guaranteed to wheat farmers shipping their crops to port -- created a number of economic distortions including too much wheat being grown on the Prairies in relation to other crops and the inefficient transportation of raw wheat, when processing before shipping would have meant a more efficient use of the transportation system.

B. The Effectiveness of Rent Regulation in Alleviating Housing Affordability Problems

Rent regulation may be intended to address the problem of housing affordability. The basic logic of rent regulation in this context is the following:

1. Affordability is determined by comparing the actual relationship between a household's housing costs and its income to the ideal relationship.

2. A household has an affordability problem if its housing costs are too large a part of income after making various adjustments such as those mentioned in Section II.
3. Rent regulation moderates rises in housing costs in the covered part of the rental housing market.
4. Therefore, rent regulation reduces the affordability problem in that a household's housing costs are kept below what they would have been in the absence of regulation.

However, in its determination of allowable rent increases, Ontario's system of rent regulation does not explicitly take affordability into account. Thus, one problem in analysing Ontario's policy is whether one of the goals of that policy is to alleviate affordability problems. This point should be considered in assessing the effectiveness of rent regulation as well as in considering alternative policies and suggestions for changes in policy.

Two issues are raised by recognition of this point: first, who the intended beneficiaries of the policy are; and, second, how efficiently the policy serves the intended beneficiaries, that is, whether the benefit to the target group is provided more cheaply than could be done by any other program. Such target efficiency is a desirable property of a policy, although it may conflict with other desirable properties such as the avoidance of stigma for the target population.

It may be questioned whether Ontario's system of rent regulation is intended to alleviate affordability problems. In the context of the most common and most widely accepted measure of affordability, namely, the rent-to-income ratio, the system does not explicitly consider affordability. If the target population is households whose ratios are "too

high," the policy is not efficiently targeted: controlled rents may rise less rapidly than they would have otherwise, but only problem households fortunate enough to obtain a controlled unit will benefit. Even for such households, rent regulation does not ensure that their rent-to-income ratios will be any lower.

The system may, however, be somewhat more efficiently targeted if one uses changes in rents in relation to changes in incomes as a measure of affordability. At least initially, the allowable rent increases approximately equal the rate of inflation. To the extent that real incomes are constant or rising, such regulation helps ensure that, according to the "changes" criterion, affordability does not become more of a problem for households living in controlled units. Unfortunately, real incomes have not stayed constant in recent years (in several years they fell), and allowable rent increases have not been closely aligned with any index of changes in prices or general income. It so happens that, in recent years, the guideline rate has lagged behind the inflation rate, so that regulation has made housing costs more affordable for some households in controlled units. It is not clear, however, that even according to the "changes" criterion, Ontario's rent regulation policy is intended to increase affordability.

Rent regulation is obviously directed toward tenants as a group, and thus it might be considered an efficiently targeted policy when the distribution-of-risk approach is applied to affordability. The target efficiency of rent regulation seems virtually tautological in this context. However, two caveats apply here. One is that many tenants do not live in controlled units; for those living in the uncontrolled sector, affordability problems, which include the risks that accompany being a tenant, may be aggravated. The other is that rent regulation may

not be the most efficient means of reducing tenants' risks. Such alternative policies as housing allowances may be more efficient; the next section will compare several different policies.

The remainder of this section dicusses the effectiveness of rent regulation in terms of the elements identified in III(A).

One criticism of Ontario's law has been that tenants have difficulty knowing what the controlled rent for an apartment is. "It is difficult for a new tenant to know what the controlled rent is for the premises as there is no provision in the Act for a system of rent registration." (Lamont, 1983, p. 186) This presents the more general issue that, until recently, the agency responsible for administering rent regulation, the Residential Tenancy Commission, did not have records of rents in Ontario; its records contained information only on applications for increases exceeding the guideline increase or from tenants' applications for review. It is expected that, partially in response to this lack of information, a rent registry will now be established. Moreover, since the rent increases not reviewed by the Commission are certainly not all within the guideline, there is no way of knowing to what extent landlords are familiar with the legislation or comply with it. Consequently, it is impossible to determine the effects and effectiveness of rent regulation.

The Social Planning Council of Metropolitan Toronto maintains that lack of information on rents is one of the most serious weaknesses of the current system in Ontario: "It is known that there are a considerable number of violations of the current rent review guidelines resulting from the inability of new tenants to determine what rents were paid by prior tenants" (Social Planning Council of Metropolitan Toronto, 1983, p. 4). This problem is discussed below in relation to the penalties for non-compliance.

A related criticism has been made by Arnott (1981, p. 11), who observes: "They [the commissioners] have not been diligent in informing tenants of their rights." He therefore recommends that the Commission become more active in educating tenants (p. 13).

Another source of difficulty has been the cost pass-through provisions of the legislation, according to which landlords may pass on higher costs (for example, for maintenance and renovation) to tenants through rent increases. The problem has been that the Commission does not allow increases until it has evidence that the work is being performed, but landlords do not want to commit themselves to expenditures until they are sure they can be covered. In the Roger Roedding case (cited in Lamont, 1983, p. 201), the Commission allowed a partial pass-through before any work was done and encouraged the landlord to "keep up proper maintenance". The Commission now requires that work be in progress or completed or that the landlord make a commitment to proceed with a fixed Schedule for Completion before it will approve rent increases (Lamont, 1983, p. 201). Thus, the landlord must still accept the risk that a given expenditure may not be allowed.

A serious problem with virtually all rent regulation is in determining the level of services provided by the landlord. Usually, the law requires that all services be maintained or the allowable rent will be reduced in accordance with the reductions in service and maintenance; this is often rational behaviour (Moorhouse, 1972). One of the easiest ways for landlords to alleviate the cash flow problems introduced by rent regulation is to reduce services and maintenance; this is often rational behaviour (Moorhouse, 1972). However, it is so difficult to measure services and maintenance that the law in this area is bound to be difficult to administer (Arnott, 1981, p. 15).[25] Therefore, although

maintenance does not appear to have been a problem yet (Ontario Ministry of Municipal Affairs and Housing, 1983, pp. 41-59), it could certainly become one, depending upon the housing market and the duration of rent regulation.

It is difficult to know how much money should be spent on the administration of a law. However, at least one critic has argued that the Commission, which has had annual budgets of $5-10 million, has been seriously underfunded since its inception in 1976 and that the following problems have resulted:

> First, they [the Commission] have not been diligent in informing tenants of their rights. Second, they have made no attempt to track down illegal rent increases; worse, when they have come across them, they have usually not prosecuted. Third, data on the pattern of rent increases in Ontario have been collected by the Ministry of Housing rather than by the administrators of rent review; meanwhile the few available data on the outcome of rent determination hearings have been collected solely for internal administrative purposes. The results provide little insight into the reality of rent determination. Fourth, the rent review administration has undertaken no research to determine, for example, how rent review is perceived by the public or how it might be improved. (Arnott, 1981, pp. 12-13)

The implication is that enforcement of rent regulation has been seriously hampered by a lack of funding as well as a lack of information, which is itself a function of regulations as well as of the lack of funding (for example, for an adequate data or information processing capability). As was suggested above, one of the key elements of effective regulation is effective enforcement. In short, there is no clear indication of the extent to which rent regulation in Ontario has had its intended effect.

The distribution of the benefits and costs of rent regulation are covered in a later section, but it is important to discuss here some points regarding fairness -- of enforcement and otherwise -- and the concentration and diffusion of costs and benefits. The first problem

relating to fairness is that, because regulation causes an excess demand for housing in the covered rental sector, there is greater opportunity for landlords to discriminate: that is, when units become vacant, landlords have a wide choice of potential new tenants and therefore have an incentive to choose "desirable" tenants, which may mean people of a particular race or ethnic group, people with a certain income or kind of job, or people with no children or pets. In short, since landlords are restricted in the financial return they can receive for a unit, they may try to increase their non-financial return in the form of more desirable tenants. It is not clear how extensive this problem has been in Ontario, but it is clear that the tendency operates against the increased affordability goal of rent regulation, since it tends to discriminate against the very people with affordability problems -- single parents, the elderly, and the poor.[26]

A second requirement for fairness is that the judicial system and administrative tribunals be evenhanded. However, there is a possibility, for which there is some evidence, that tenants are naive and underrepresented in legal actions and that judges and administrative officials have a natural bias towards landlords, rather than tenants, because of their greater socioeconomic affinity with the former group (Miron and Cullingworth, 1983, pp. 74-77).[27]

The distribution of the costs and benefits of rent regulation are likely to affect the stability of the legislation (Wilson, 1974). If the costs of the legislation fall to a small, well-organized group, there will likely be persistent (and probably well-financed) opposition to rent regulation. If, on the other hand, the benefits are concentrated on a small group, such opposition would be countered strongly by the beneficiaries of the legislation.

The benefits of rent regulation tend to be more widely diffused than the costs, but since the benefits are not trivial, there is strong incentive to acquire and defend them. Moreover, the organizational problems that usually weaken or defeat diffused-benefit regulation are smaller in this case because the beneficiaries -- namely, tenants -- live close to each other. One large apartment building contains many voters, and downtown land values ensure that apartment buildings are large and often close together, so that the organization of tenants and communication among them are further facilitated. Unfortunately, such ease of organizing has nothing to do with affordability: the two are virtually independent. Indeed, the people with the greatest affordability problems -- the poor and the elderly -- may be at a disadvantage when participating in tenants' organizations and directing the form of rent regulation towards the affordability goal (for example, by freezing rents for people on fixed incomes rather than allowing a small increase for the larger group of tenants, who may have little or no affordability problem). The ease with which tenants can be organized yields political power (Marks, 1983) and is a primary reason that Arnott states: "Because rent controls can, for political reasons, prove difficult to remove, it may be better not to introduce [them] at all" (1981, p. 31). This is a particularly cogent argument since political opposition to decontrol may be unrelated to any reasonable affordability goal.

What about the distortions or the incentives for "undesirable behaviour" induced by rent regulation? One of the most serious problems of rent regulation is that, as it becomes more effective in alleviating the affordability problems of one part of the population, it aggravates the affordability problems of another part. More specifically, data from

a number of sources show that, as rent regulation keeps rents down in controlled units, it tends to raise rents in uncontrolled units, so that those tenants who are not fortunate enough to obtain controlled units may face an aggravated affordability problem when they turn to the uncontrolled sector for housing. Since controlled landlords may be "choosier," the households forced into the uncontrolled market tend to have the most serious affordability problem. (These distortions are discussed in more detail below).

What incentives for compliance do the penalties for non-compliance present? Under the law, two offences carry penalties: knowingly failing to obey an order of the Commission and knowingly furnishing false information to the Commission. The maximum penalties are $2,000 for an individual and $25,000 for a corporation. If these penalties are imposed for every unit under review, then they may provide adequate deterrence, providing they are actually imposed. There are no readily available data to prove whether they are. If the maximums apply only to the entire building in question, it is not clear what incentive for compliance they impose if the gains from breaking the rules (that is, by raising the rents) are large enough.

The more troublesome aspect of the law is that there is no penalty for simply charging too much rent. Although tenants are not required to pay rents that are above the permitted level, most tenants do not know what the legal rent is. Moreover, if a landlord receives too much rent, she or he is, at worst, required to repay the excess amount. Seeing that the probability of being found out is slight, especially if the landlord has a good sense of the tenant's knowledge and propensity to dispute the increases, widespread non-compliance with the law is likely. This is, indeed, what the evidence suggests:

TABLE 7

Median Rates of Return,
Controlled and Uncontrolled Rental Buildings, 1980

	Uncontrolled	Controlled	Total
Number of buildings	12	54	66
Net operating income rate (%)	6.7	9.9	9.3
Cash-on cash yield (%)	-10.2	10.7	6.9
Price appreciation (%)	1.9	4.0	3.6
IRR[a] on capital (%)	7.3	11.8	11.0
IRR[a] on equity (%)	-7.1	18.6	13.9

a IRR = internal rate of return

SOURCE: Adapted from The Impact of Rental Review on Rental Housing in Ontario, Ministry of Municipal Affairs and Housing, July 1982 (see Chapter 4) by the Social Planning Council of Metropolitan Toronto, February 1983, Table 6.

> The data indicate that average rent increases in apartment units subject to rent review, but which did not go before the Commission, averaged 10.7 percent in 1982. The comparable figure in 1981 is 7.8 percent. The average increase in 1982 is more than 75 percent above the 6 percent ceiling. The implication of such a massive discrepancy can only mean that a significant number, probably more than half, of all landlords are raising rents illegally. (Social Planning Council of Metropolitan Toronto, 1983, p. 10)

Additional evidence is provided by the relative financial performance of controlled and uncontrolled rental buildings as presented in Table 7. Although this evidence does not prove non-compliance, this is a reasonable explanation in light of the incentives for compliance provided in the law. Thus, it seems sensible to impose some penalty on a landlord who collects too much rent; there may, however, be constitutional problems with attempting to do so.

The foregoing discussion of the effectiveness of rent regulation in alleviating housing affordability problems rested on the assumption that

the logic of rent regulation presented at the beginning of this section is correct: rent regulation alleviates affordability problems because it holds down the price of housing. The emphasis has been upon making the rules "stick".

What must be considered is whether the logic of rent regulation is correct.

One problem with rent regulation is that, although it may make housing more affordable for those fortunate enough to find a unit in the controlled sector (apart from the increased costs of searching for such housing), it may aggravate the affordability problem for those who cannot find rent-controlled housing.

Most analysts agree that rent regulation causes the demand for controlled units to exceed the supply. This excess demand in the controlled sector must be met by housing in the uncontrolled sector or dissipated in some manner, such as doubling up or moving out of the market. Thus vacancy rates in controlled sectors are usually close to zero while vacancy rates in uncontrolled sectors are much higher. At present, the only systematically collected evidence of this phenomenon comes from the Quebec Rent Commission's data on Montreal (Whittingham, Feb. 4, 1978, pp. 1, 4) since, in its April and October surveys, CMHC does not differentiate vacancies by control status. Since an equilibrium vacancy rate is usually considered to be 2-5 per cent (Clayton and Lampert, 1982, p. 56; Lett, 1976a, pp. 39-40), a zero rate is some evidence of excess demand in the controlled sector.

Such a low vacancy rate suggests that it is very difficult to find a controlled apartment. With a virtually zero vacancy rate in the

controlled sector, the search by households without a controlled unit may lead them into the uncontrolled sector or out of that particular housing market entirely. The resulting pressure on rents in the uncontrolled sector may simply aggravate the affordability problem for such households.

Another indication of excess demand is the contrast between the rate of rent increases in the two sectors. For example, Table 8 shows how much more rapidly rents in the uncontrolled sector of the Toronto CMA rose for the six, twelve, and eighteen months preceding October 1982. Although bachelor apartments exhibited about the same pattern in the two sectors, uncontrolled units with one, two, and three bedrooms had much more rapidly increasing rents; as might be suspected, their rent levels were also considerably higher.

What is not certain, however, is whether uncontrolled rents are any higher than rents would have been in the absence of controls. The question is important because, if households are paying no more than they would have in the absence of controls, it can be argued that they are not hurt by the rent regulation and at least some needy households in the controlled sector are helped. Fallis and Smith (1984) argue that rents in the uncontrolled sector tend to be higher when controls are in effect. Therefore, the alleviation of affordability problems in the controlled sector may be more than offset by the aggravation of affordability problems for households relegated to the uncontrolled sector. Recalling that landlords in the controlled sector may try to choose only the most desirable tenants, households relegated to the uncontrolled sector may already be those with the most severe affordability problems.

TABLE 8

Average Rents by Unit Type and Rent Review Status, Toronto Census Metropolitan Area

	Subject to Rent Review				Not Subject to Rent Review			
	Apr. 1981	Oct. 1981	Apr. 1982	Oct. 1982	Apr. 1981	Oct. 1981	Apr. 1982	Oct. 1982
Bachelor	246	258	269	285	328	339	371	375
1 Bedroom	296	311	328	344	389	412	448	467
2 Bedroom	344	361	382	401	416	443	485	518
3 Bedroom	407	421	452	478	459	486	542	584

Average Rent Increases by Unit Type and Rent Review Status, Toronto Census Metropolitan Area

	Subject to Rent Review			Not Subject to Rent Review		
	18 months	12 months	6 months	18 months	12 months	6 months
Bachelor	15.9	10.6	6.1	14.3	10.5	1.1
1 Bedroom	16.2	10.5	5.0	20.1	13.4	4.3
2 Bedroom	16.6	11.0	5.1	24.5	16.8	6.7
3 Bedroom	17.4	13.6	5.7	27.2	20.2	7.8

SOURCE: Canada Mortgage and Housing Corporation, Rental Ranges of Occupied and Vacant Units, April and October, 1982. (Social Planning Council of Metropolitan Toronto, 1983, Table 3).

Marks (forthcoming) demonstrates the conditions under which rents in the uncontrolled sector may closely approximate what rents would have been in the absence of regulation: if controls are virtually universal or demand is highly elastic, households moving to the uncontrolled sector may suffer little as a result of rent regulation. This result has been suggested independently by Arnott (1981, pp. 53-67). Marks's study suggests that prices in the uncontrolled sector depend upon the relative sizes of the two sectors, on demand elasticity, and on the levels of controlled and uncontrolled rents. These same factors determine the

relationship between controlled and uncontrolled rents and what rents would be in the absence of any control.

Nonetheless, rent regulation clearly may not be a very efficient means of addressing the affordability issue; its benefits are not concentrated among households with affordability problems. This may not be surprising, given that it is not certain whether a goal of rent regulation is to increase affordability. Various authors have noted that the benefits of rent regulation -- namely, lower-than-market rents -- go to many households that could afford market rents (e.g., Kain, 1969, pp. 3-4; Ault, 1981, p. 57; Rea and Gupta, 1982, p. 31). Moreover, a recent empirical study done for the Ontario government made a crude estimate, based on the 25 per cent measure for rent-to-income affordability, that "about one-third of the rent savings goes to problem households and this is equal to about one-fifth of the total cost of the program" (Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 121). The report concludes:

> Regardless of which threshold is used, rent review cannot be viewed as an efficient means of approaching the affordability problem. A one-third target efficiency is not a good performance. Still worse is the performance in meeting the problems of those in greatest need.

Thus, as an affordability policy, rent regulation is not efficiently targeted.

We must also realize that, even if rent regulation reduces some affordability problems now, it may lead to more serious problems in the future. This issue deals with the effect of rent regulation upon the supply of rental housing. The speed with which housing supply adjusts to price changes in the market bears on the advisability of rent regulation (cf. the discussion in section IV(B). One of the more compelling

arguments for some form of rent review is that demand can probably change faster than supply in housing markets and that housing "emergencies" can arise (Lett, 1976b); therefore there may be some need to smooth price movements if that can be done without distorting market signals to suppliers (Arnott, 1981, p. 30). But this is not easy, and it becomes politically tempting to go from a "damping" function to a "restricting" function.

According to conventional analysis, if rents throughout a market are kept below their market-clearing level (that is, the level at which supply equals demand) and the market works well, returns on investments in rental housing will fall and consequently investments in rental housing will fall. This phenomenon represents the inefficiency of rent regulation. Moreover, there is widespread evidence of a coincidence between rent restrictions and a reduction in the supply of housing (Bruce-Briggs, 1976; Lett, 1976a; Howenstine, 1977; Davidson, 1978; Smith and Tomlinson, 1981; Shortell, 1981; Marks, forthcoming). Unfortunately, a market never operates two ways at the same time, so that it is difficult to estimate the size of the effect that the various forms of rent regulation have had upon housing supply over the years. However, the logic of the argument is compelling if one considers the efficient operation of the housing market to be desirable. If the government causes rents to be lower than the market would have caused them to be, there will be less incentive to invest in rental housing, that is, to become a landlord. The consequences of reduced investment may be both less new construction and reduced maintenance of existing housing. As an example, Marks (forthcoming) estimates that, in relation to what would have existed without rent control, Vancouver's rental housing supply was reduced by about six per cent under the November 1980 rental housing

conditions in that city; he suggests that the supply reduction became even greater over time.

While there is a dearth of careful studies of the effects of rent regulation, the thorough ones conclude that rent regulation effects large transfers of money from landlords to tenants (Olsen (1972), Marks (1984), Marks (forthcoming)). Moreover, the transfers are large not only in total but also on a per-unit basis: for example, Marks (1984) finds that removal of Vancouver's "second-generation" rent regulation at the margin from a quality-constant unit would have allowed its monthly rent to rise 33.5 - 71.4 per cent, or $78.11 to $156.43, in 1978. In another paper, Marks (forthcoming) estimates that blanket removal of rent regulation would have raised monthly rents by $22-172 per apartment on average (depending upon demand elasticity) in November 1980 in the City of Vancouver. Olsen estimates that the 1.3 million households living in controlled units in New York City in 1968 received an average benefit of $18 monthly.

Such a reduction in the return on landlords' investments is the essence of the argument that rent regulation reduces investment in housing, thereby reducing the long-run supply of housing and raising its relative price. Other things being equal, a higher price in the future means greater affordability problems.

It should be mentioned here that those measures of redistribution do not consider the additional welfare cost of rent regulation, that is, the reductions in consumers' satisfaction and investors' profits arising from the smaller long-run supply of housing and the costs of administering the law. Arnott argues correctly that these costs are real but are often disregarded because they are "invisible" (1981, pp. 23-25). Basically,

they are the benefits lost to potential buyers and sellers from transactions that do not take place because of the reduced supply of housing resulting from rent regulation.

Although it is difficult to measure this welfare or efficiency cost because it is not directly observable, Olsen estimates that, in 1968, it and the cost of administering controls in New York were about $251 million, or about 48.2 per cent of the total cost of New York controls that year ($521 million). This figure compares with benefits conferred upon tenants of about $270 million.

Once again, it can be seen that the redistribution effected by rent regulation may be desirable, but it may not be very efficient.

There are two caveats here, however. First, as is discussed in the next section, the market itself may not work very well: there may be a lack of competition in small local markets or new suppliers of housing may be slow to enter the market because of extensive government intervention in the housing production process. In such cases, landlords may be able to reap large excess profits because of either market power that is dissipated only slowly by the entry of new suppliers or the slow adjustment of prices to a new competitive equilibrium (which prices may still be higher than necessary because of the unnecessarily high costs of production resulting from regulations such as building codes).

In addition, the degree of inefficiency resulting from regulations and the effect on housing supply depend upon the form of the rent regulation. Regulations like Ontario's, which allow exemption of new construction, cost pass-throughs, hardship increases, increases within a guideline, and increases sufficient to allow reasonable rates of return obviously may distort investment less than a rent freeze, other things being equal. By exempting new construction and allowing reasonable

maintenance costs to be passed on to tenants, the Ontario law limits the disincentive of new investment in rental housing and probably has significantly less influence on supply than universal and more restrictive controls would have. Indeed, the distorting effect may be limited in Ontario to (1) a belief by investors that returns to housing may be somewhat riskier because of rent regulations that may some day be strengthened; and (2) changes in the standard of maintenance both because of the particular cost-pass-through provisions of the regulations that may lead to inefficient (perhaps too much) maintenance and because of below-market returns to maintenance (if costs cannot be passed on) resulting from the restriction on rents. However, while supply effects in Ontario may be minimal, many believe that Ontario's rent regulation is also not very effective in increasing housing affordability (Social Planning Council of Metropolitan Toronto, 1983).

On the other hand, evidence suggesting that rent regulation has made housing more affordable in Ontario is provided by Miron and Cullingworth (1983). Using the rent-to-income test, they show that there were fewer households with an affordability problem in 1978 than in 1976 (1983, p. 127). However, they acknowledge three fundamental problems with attributing the improvement to rent regulation: (1) the change is so small that it may be due simply to a difference in the sample of households analysed; (2) there was a change in the definition of unsubsidized households, which removed from the category a group of households that would have had a high incidence of affordability problems (that is, households receiving rental assistance from relatives), and (3) affordability problems may have been reduced by an increase in the supply of public housing or by changes in demographic or economic conditions.

In addition, there are all the problems with the validity of such measures that were described in Section II.

Other data used by both Miron and Cullingworth (1983, p. 130) and the Ontario Ministry of Municipal Affairs and Housing (1982b, p. 120) show that, if rents had been higher in Ontario in 1978, more households would have had affordability problems as measured by the ratio test. This would seem to suggest that rent regulation enhances affordability. However, aside from any reservations about the validity of the ratio test, this conclusion disregards the fact that, although rents might have been lower in the controlled sector, they might have been higher in the uncontrolled sector; fewer affordability problems in one sector may mean more in the other. Moreover, the measure is short-run and does not take account of the overall (including long-run) effect of rent regulation upon affordability. All in all, the evidence is not convincing that rent regulation alleviated affordability problems in Ontario from 1975-78.

In summary, two aspects of effectiveness have been considered: first, the means by which the regulation affects the behaviour of landlords and tenants and second, whether the regulation, if behaviour is changed, has the desired effect, namely, to alleviate affordability problems. In the first regard, it is apparent that the current administration of rent regulation in Ontario suffers from a number of problems, the most important of which are that information is not complete and is not disseminated widely enough and that the incentives for compliance are not strong enough. The rest of the discussion suggests that current rent regulation in Ontario may have very little impact upon the affordability problem. Rent regulation simply makes housing less expensive for some people and more expensive for others. Moreover, the latter group may be

the people with the most serious problems. In addition, the scattered evidence on the effects of rent regulation suggests that any benefits are bought at a fairly high cost. In light of these conclusions, the next section suggests how rent regulation may be more effectively targeted on households with affordability problems if that is chosen as a goal of policy and how it may be altered to satisfy many investors' objections that such a policy inhibits investment. In addition, the next section considers a number of alternatives to rent regulation.

IV. POLICY ALTERNATIVES AND AFFORDABILITY

A. Direct Policies

Many policies other than rent regulation can affect the affordability of housing. Some affect the demand side of the market and hence the consumer's ability to pay and the price he or she bids for housing services; others affect the supply side of the market and hence the cost of production and the price at which housing services are offered. In addition, some policies affect housing affordability directly and others, indirectly. The matrix below provides examples of policies that fit into each of the four resulting categories. We shall focus upon direct policies in the discussion below. Given the number of policies that can have a direct or indirect effect upon the housing market, we shall limit our analysis to a small sample of the more important ones.

	Demand	Supply
Direct	housing vouchers	public housing
Indirect	employment tax credits	reduced enforcement of building codes

The four types of direct programs discussed here -- income maintenance, housing allowances, public housing, and production subsidies -- are virtually impossible to compare on the basis of, say, benefit-cost analysis. Ideally, we would impose each policy upon a housing market, determine its costs and benefits (over the long run, of course), and then "start the market over again" under a new policy until all the alternatives have been tried. Obviously, such an ideal evaluation is

impossible. It is also impossible, for the reasons listed below, to arrive at any comparative evaluation that indicates what Ontario should choose as an affordability policy:

1. Theoretical evaluations usually deal with "caricature" policies that do not perfectly match any particular government policy. Moreover, administrative issues such as efficacy of enforcement and penalties for non-compliance are routinely avoided, despite the fact that they are critical in ensuring that the policy has its intended effect.

2. In particular, there are probably as many forms of rent regulation as there are jurisdictions that have, or have considered adopting, such laws. Moreover, the effects can be highly sensitive to the local market. Therefore, it can be misleading to rely on existing studies of rent regulation; any extrapolation should be done carefully and probably should be limited to qualitative rather than quantitative conclusions.

   > The costs and benefits associated with rent control are sensitive to both the details of the rent control program and the characteristics of the housing market in question. ... it is pointless to debate in general terms such matters as the optimal duration of controls. Clearly, the optimal period depends on the specific characteristics of the housing market and rent control program in question. (Arnott, 1981, pp. 30-1; italics in original)

3. The various studies that are available are for different markets at different times and use widely varying measures of effectiveness. Interestingly enough, rent regulation is a policy whose popularity far outweighs our knowledge of its effects -- probably more so than any other major housing policy. There are surprisingly few good studies of its effects.

For those reasons, the comparison does not attempt to be specific to Ontario.

The central theme of the discussion is the target efficiency of the various policies. Since policies may be compared along a multitude of dimensions -- simplicity of administration, ideological purity, out-of-pocket cost, and so forth -- target efficiency in alleviating affordability problems has been chosen as a dimension particularly relevant to the topic of the paper.[28]

Guaranteed Income

Since the ability to afford proper housing is closely related to income levels, a guaranteed income plan, such as a negative income tax (NIT), might have broad appeal as a housing affordability policy. This type of plan would provide a guaranteed annual benefit to all households, with the amount of the guarantee to be determined by the households' size, structure, and other income. As a household's other income rises, the amount of the benefit would fall, but not dollar for dollar. With a benefit-reduction (or tax) rate of well below 100 per cent, the plan would maintain an incentive for household members to increase other income (for example, through employment) because, through such increases, their total income rises at the same time as they are receiving partial benefits. This combination of other income and benefits would provide income security until the household no longer required benefit payments.[29]

An NIT affects housing affordability by increasing the income of the poorest households, presumably making them better able to pay for all their needs, especially if the guaranteed level is set so as to allow them to pay for adequate housing.[30] Most of the analysts of such policies agree that the NIT is, from virtually every point of view, the most efficient means of redistributing income and increasing the satis-

faction and well-being of low-income households for a given government expediture.

One of the chief difficulties with such plans is that they are more suited to the federal than the provincial level. Second, they face an inevitable trade-off among the goals of adequacy, target efficiency, and incentive. To understand this difficulty, one must understand the concept of the "break-even point" in such programs -- that level of total income at which benefit payments are reduced to zero. In most NIT schemes, the break-even income is the guarantee level divided by the tax rate: a $5,000 guarantee with a 50 per cent tax, or benefit-reduction, rate has a break-even income level of $10,000.[31] Thus, if the guarantee is raised to ensure an adequate income, the income that is still eligible for some benefit is raised, and the more likely it is that households that are not poor receive benefits (target inefficiency). Raising the tax rate would reduce the break-even point but would also reduce the incentive to work. (For example, a 100-per cent tax would ensure that only the poor got benefits, but there would be no incentive to work.) Every manipulation of the tax rate or guarantee serves one of the purposes of the program but works against another.

Third, an NIT may be an inefficient policy for achieving its intended goals, although it is generally considered the most efficient means of alleviating poverty. But therein lies the problem. It may be that the objective of the policy is not to maximize low-income households' well-being -- as judged by the households themselves -- for a given government expenditure, but to maximize that well-being in the eyes of the donors, namely, the voters. Whereas untied cash transfers are the most efficient means of enhancing a household's well-being -- if the

households can be expected to know their needs (Aaron and von Furstenberg, 1971) -- some other form of aid may be more appropriate if voters doubt the choices made by such households.[32]

Housing Allowances

The policy that has much of the appeal of an NIT but avoids the last-mentioned objection to the NIT is some type of housing voucher or allowance. Indeed, it can be shown that housing vouchers result in a greater consumption of housing than an NIT plan with the same budget. (The latter would result in greater well-being as judged by the households themselves.) The basic idea of housing vouchers is that they provide a guaranteed income for housing, with the amount of aid determined by the household's size, structure, and, perhaps, location. If the household has an income, it is guaranteed the difference between a proportion of that income that should be devoted to rent (for example, the traditional 25 per cent) and fair market rent for an adequate rental unit; in the absence of any income, an allowance equal to the entire rent is provided. Like the NIT, a household does not lose a dollar's worth of voucher for every dollar by which its income rises; thus, the incentive to increase household income is preserved. Indeed, the tax rate may be well below 100 per cent.[33] In addition, a condition of the aid may be that the household must purchase adequate housing -- a condition that may discourage some types of households from participating since it may involve moving and/or an increase in the household's outlay for housing (Friedman and Weinberg, 1982, pp. 72-75).

Housing allowances have often been considered an improvement over rent regulation (Clayton and Lampert, 1982, p. 57; Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 121), even though they are not

used much in Canada and are still in the experimental stage in the United States.[34] They have three goals: increased affordability of housing; greater access to adequate housing; and greater program efficiency than the various supply-oriented policies. Analysts of the housing allowance experiments in the United States have emphasized these goals as well as the suitability of housing allowances for achieving them:

> Lack of purchasing power is certainly one factor in the housing problems of lower-income households. If poor households were given additional purchasing power, and if they chose to spend substantial proportions of that purchasing power on housing, then they could effectively demand housing of higher quality. Additionally, since program recipients would be renting existing units, rather than living in new units specially built as subsidized housing, lower program costs are anticipated. (Struyk, 1981, p. 5.)

The following questions should be considered in the development of a housing allowance policy:

1. Who will participate in such a program, especially if participation requires a household to consume "adequate" housing and to spend up to 25 per cent of its income (including allowance) on housing when it is currently spending a smaller proportion? To what extent does a housing allowance alleviate affordability problems?
2. How much will household non-allowance expenditures on housing rise in relation to the size of the allowance?
3. How much of the increase in a household's expenditure on housing will represent higher quality and how much simply a higher price? In other words, how will the suppliers of housing respond to the increased expenditures induced by a housing allowance?

Some answers can be found in the numerous studies of the Experimental Housing Allowance Program (EHAP) that took place during 1973-75 (demand experiment) and 1973-80 (supply experiment) in several local markets in

the United States (Struyk and Bendick, 1981; Bradbury and Downs, 1981; Friedman and Weinberg, 1982; Friedman and Weinberg, 1983).

Households participating in the program apparently experienced an easing of affordability problems:

> At enrollment, rent burdens in the Demand Experiment sites averaged approximately 40 percent. Housing allowances sharply reduced recipients' contribution to rent and reduced rent burden to an average of 25 percent in the Demand Experiment sites. (Struyk, 1981, p. 13)

Without examining how efficiently such rent-to-income ratios were reduced, housing obviously became more affordable for these recipients, but through an increase in income rather than a decrease in rent. Some groups, however, were unwilling to participate in the program. Welfare recipients, households headed by a member of a minority, and single-parent households participated more than households with earned income, with a non-minority head, or with two spouses. The elderly had low participation rates, as did homeowners in comparison to renters. With the exception of the elderly, participation was thus higher among households that tended to have affordability problems. Some households preferred to live with their affordability problems and refused to move or upgrade their dwellings. The reasons most often given were ties to the neighbourhood and scepticism about finding a better unit; discrimination also hindered the mobility of the minority group members.

The Struyk and Bendick study also found that "households in the worst housing ... also had the lowest rates of participation" (Struyk, 1981, p. 12). It should be pointed out that households were guaranteed payments of 80-120 per cent of the fair market value of their housing needs with a requirement that they spend 15-35 per cent of their income (including the allowance) on housing of "adequate" quality. ("Adequate" was given a range of definitions.) Thus, the preferences of households

differ enough that some households would rather accept an affordability problem (as conventionally defined) than incur the costs of moving or upgrading their housing. They also might consider conventional rent-to-income ratios unaffordable.

Another interesting finding was that the amount of the allowance households spent, past the amount required for eligibility, differed by market. In a tight market with limited mobility (Pittsburgh), the proportion of the allowance spent on housing was smaller (10 per cent) than in a looser market with more mobility (Phoenix), where the proportion rose to 25 per cent (Struyk, 1981, p. 13). Both the static and short-run income elasticities for renters were estimated to be 0.11 to 0.44 while the long-run income elasticity was estimated to be 0.14 to 0.97. (That is, a 10 per cent increase in income led immediately to a 1.1-4.4 per cent increase in household expenditure on housing; the total increase in household expenditure on housing from such an income increase was eventually 1.4-9.7 per cent.) As one might expect, the income elasticity with respect to an estimate of permanent income was larger than with respect to current income (Cronin, 1981, pp. 164-66), since permanent changes in income are more likely to yield sustained changes in consumption patterns than temporary changes in income.

The participation response and income-inelastic demand response (that is, the percentage increase in expenditure for the good -- namely, housing -- was smaller than the percentage increase in income so that housing got less than its usual share from the income increment) both served to weaken any effect of the program on housing prices: "Programs on the scale of those tested in EHAP -- including an entitlement program [universal coverage subject to eligibility and participation] in two markets -- will cause little if any inflation in rents for recipients and

no inflation at all in rents for others" (Struyk, 1981, p. 15). Part of this small effect was apparently a result of poor shopping by recipients.[35] Although it may be premature to conclude that housing allowances do not lead to higher rents, the evidence from EHAP suggests such a policy would not inflate rents.

The lesson from the experiments is that housing allowances can allow access to adequate housing for about 50-75 per cent of the cost of new construction, such as public housing, while giving the recipients more satisfaction and preventing further racial and economic segregation (Friedman and Weinberg, 1982, p. 146). Allowances can result in more consumption of housing than equal-dollar cash transfers if there are strict regulations regarding the types of housing that are eligible, but such requirements reduce participation (Friedman and Weinberg, 1982, p. 146). This is simply another way of saying that cash transfers are the most efficient means of redistributing income if we are willing to defer to the recipients' preferences; however, if the program imposes enough conditions for eligibility, people will not take money from the government. The EHAP experiment found that the affordability problem could be addressed effectively when divorced from an adequacy requirement: households were quite willing to accept an allowance that brought their rent-to-income ratio to 25 per cent if there were no constraints on what housing they consumed.

This last finding is consistent with the Canadian experience with housing allowances, which are aimed at older people (except in Manitoba, where low-income families with children are also eligible). There are serious questions about whether such a program truly addresses affordability and adequacy, since the adequacy requirements may deter people from participating (Falk, 1982). Of course, a housing allowance

with no quality restriction is simply a form of cash transfer whose amount depends on the household's current rent-to-income ratio or some variation of it.

Thus, of the demand-side programs, a housing allowance may be more politically acceptable, although its ability to address the affordability problem may be seriously hampered by the extent to which eligibility is conditional upon the consumption of adequate housing. If there are no conditions, the allowances may lose much of their political appeal.

Housing voucher plans may also violate what some consider to be another goal of affordability policy, namely, to avoid stigmatizing the recipients -- a goal that an NIT may also miss. The issue here is that policies such as the NIT and housing vouchers give benefits only to those households "in need," and in a competitive economy where wealth is equated with success, people do not want to be considered needy. For that reason, one might prefer a policy that distributes benefits to everyone so that the needy are less distinguishable. This reasoning is fundamental to the idea of universality in access to various social services and forms of income maintenance. However, it conflicts with efficient targeting so that one must decide what price to pay in providing benefits to everyone in order to avoid the stigmatizing effect of a targeted program.

This importance of universal access may be one of the fundamental appeals of rent regulation over various cash-grant plans such as those discussed above. The fact that rent regulation is a very blunt and inefficient tool for redistribution (Miron and Cullingworth, 1983, pp. 171-3) is an obvious weakness from one perspective but a strength from another (Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 123).

Therefore, an effective affordability policy must target the recipients of the policy's programs; otherwise the alleviation of affordability problems becomes a by-product of a policy protecting consumers in general from rising prices. Here again, it is essential to determine what the goal of policy is.[36]

Public Housing

Two supply-oriented policies that address affordability are public housing and construction subsidies. The former increases affordability by directly increasing the supply of housing and, more particularly, by ensuring that all or most constructed units go to the neediest households. The latter reduces the cost of producing housing and thereby increases the incentive for the entrepreneur to build housing. Such subsidies may not have conditions specifying who may live in the subsidized housing, but they lower the price of housing by increasing the supply. Even if the subsidies do not directly stimulate the production of housing for low-income households, they would aid such households through the filtering process.[37]

Examples of the public housing policy in Canada are sections 40 and 43 of the National Housing Act. Section 40 provide for the federal government to pay 75 per cent of capital costs and the provincial governments 25 per cent; operating losses are covered by the two levels of government in the same proportions. Under section 43, the federal government provides low-interest, long-term mortgages for 90 per cent of capital costs and assumes 50 per cent of annual operating losses for housing that, like section 40 housing, is rented to low-income households at rents they can afford (usually no more than 25 per cent of adjusted income). An example of the construction subsidy program is the Assisted

Rental Program (ARP), which provides direct subsidies and financing assistance to any private entrepreneur building rental housing. Whereas funding under sections 40 and 43 is still available, the ARP program ended in 1978.

Public housing, which is a form of geared-to-income housing, has traditionally been viewed as the most effective and direct means of addressing the affordability problem. If the market seems unable to provide proper combinations of incomes and rents for some portion of the population, the government simply fills the gaps directly by financing public housing and operating it. This housing is built for low-income households, and the rents charged are limited to 25 per cent of their income. Therefore, this housing is, by the usual measure, affordable to its tenants, and the policy is highly target-efficient. Moreover, the costs of public housing that are not covered by rent are paid from general revenues so that the redistribution is explicitly from the rest of society to the target population. If public housing units represent net additions to the supply of adequate housing, then its production does not tend to increase the competition for local housing. Table 9 lists the average subsidies to Ontario public housing tenants in 1983.

There are five main criticisms of public housing. The first is that the provision of new or recently built housing to low-income households is inefficient; it is argued that it would be more efficient to rely more on the filtering process of the private market, perhaps through a combination of construction subsidies and housing allowances. A second criticism, which is related to the first, is that, in its long history, public housing simply has not solved the housing problem, in large part (it is argued) because of its expense. For example, in 1972 in the United States, only a small proportion of eligible households lived in

TABLE 9

Average Monthly Geared-to-Income Subsidies, 1983

	$/Unit/Month	$/Rentable Room/Month
OHC[a] Metro Toronto	295	66
OHC[a] Province (excl. Metro Toronto)	207	50
Senior citizens	179	52
Families	261	48
OHC[a] project total	238	56
MTHCL[b] (senior citizens)	134	49
Commercial rent supplement	225	57
Community-sponsored rent supplement	253	--[c]

a OHC: Ontario Housing Corporation
b MTHCL: Metropolitan Toronto Housing Company Ltd.
c Subsidy per Rentable Room cannot be calculated for Community Sponsored (non-profit) rent supplement units because geared-to-income assistance is not tied to particular units.

SOURCE: Ontario Ministry of Municipal Affairs and Housing, 1983, Table 42, p. 68; OHC 1983 budget and additional staff calculations.

public housing; indeed, only 7 per cent of eligible households were receiving any form of federal housing assistance (Struyk, 1981, p. 5). The third criticism is that public housing does not provide the greatest satisfaction among the recipient households for the money spent (Struyk et al., 1978, p. 98); however, most housing programs have this weakness, and the relevant question concerns the most cost-effective housing policy. More than most other housing policies, public housing tends to

set low-income households off from the rest of the community both because it looks "different" and because it concentrates such households in certain areas.

The fourth criticism is perhaps the most serious and yet the most difficult to incorporate into a comparative evaluation of housing policies:

> This report strongly recommends that the public housing program in its present form (the construction of new highly-subsidized units to be owned by the public and occupied only by the poor) be abandoned. Some of the reasons for so doing are contained in our review of program performance: the poor locations found for residual housing, problems of design caused by cost cutting or attempts to build outstanding housing for the poor; high density, high-rise housing dictated by cost concerns; insensitive management that treats public housing tenants as welfare clients; the negative attitudes of administrators, surrounding neighbourhoods, and the public generally. All are aspects of the stigma inherent in a program aimed only at the poor. (Dennis and Fish, 1972, p. 218)

Many of these same problems were raised by the U.S. National Commission on Urban Problems (Taggart, 1970, p. 33), which added that the composition of public housing (for example, the number of bedrooms) may be more permanent and unchangeable than the composition of the low-income population so that a serious mismatch may result. Similarly, public housing has generally not been well placed, and thus it has not been integrated well into the residential pattern of various communities. This last criticism is based partly on the same objection as the first, namely, that public housing is not normal housing. It also reflects the third problem -- that the tenants would often rather have benefits in cash than in kind.

The fifth objection to public housing is that it establishes special treatment for low-income households and thereby isolates and stigmatizes them. It was previously noted that this criticism is the basis for a preference for rent regulation over policies like housing allowances.

The trend toward non-profit housing programs is an attempt to meet some of this criticism by encouraging the dispersion of low-income households among other households in a given project (Ontario Ministry of Municipal Affairs and Housing, 1983, 69-77).

One of the few published empirical studies that compares public housing with an alternative program provides some support for the argument that public housing may not be the most efficient use of funds. MacMillan and Nickel (1974) compared the costs of public housing and 100-per cent rental supplements paid to welfare recipients in Winnipeg in 1971. They made crude estimates that it was about 38 per cent less expensive to provide housing through rent supplements than through public housing: the annual cost of public housing was about $1.6 million for 817 households, while the annual costs for these households with 100-per cent rent supplements was about $1.0 million. It should be emphasized that their estimates are crude. For example, it is not clear from the study whether the rented housing was adequate or whether the samples of public housing and supplement households were well-matched. Moreover, there is no discussion of the sensitivity of the results to the tightness of the particular housing market. Nonetheless, the study does lend some strength to the argument that it may be more efficient to rely on existing housing.

While it is impossible with available data to replicate the comparison for Ontario, it is possible to attempt a comparison. According to the Ontario Ministry of Municipal Affairs and Housing, the average income of a four-person household in rental public housing in 1981 was $10,694, which in 1983 would be about $12,300 to 12,900 (assuming an increase in income of 15 to 20 per cent over the two years)

(Ontario Ministry of Municipal Affairs and Housing, 1983, p. 64). Using the 25 per cent rule for tenants, such a household would pay $256.25 to $268.75 a month for public housing in 1983. To this figure can be added $261, which is the average public housing subsidy paid to families outside Toronto (see Table 9). Thus, the total rent paid for such a household would be approximately $520-$530; presumably this is the amount of the public housing subsidy for households that cannot afford to pay any rent. Table 8 shows that a three-bedroom apartment in Toronto rented for $478 in the controlled sector and $584 in the uncontrolled sector in October 1982; comparable figures for two-bedroom units are $401 and $518, respectively. (Outside Toronto rents would probably be lower.) These figures suggest that public housing may have been more cost-effective in Ontario in 1983 than in Winnipeg in 1971.

Construction Subsidies

Construction subsidies (other than those for the construction of low-income housing) can be an effective instrument of an affordability policy if the filtering process operates in housing markets. That is, construction subsidies induce producers to supply more housing to the most profitable segments of the market. As the new housing is sold, a greater supply of rental housing eventually becomes available at the lower end of the market, and the price falls for a given demand. When this process does not work, construction subsidies have little or no value in enhancing affordability.

Although there are numerous studies of the effectiveness of public housing, there are virtually none of the Assisted Rental Program (ARP) of construction cost subsidies. The one study available analyses the extent to which ARP and multiple unit residential building (MURB) benefits

allowed investors to earn higher rates of return than on other investments, thereby inducing greater investment in the rental housing market and thus greater supply and lower prices, other things being equal (Gau and Wicks, 1982). If projects under these programs yield above-market rates of return to their investors or, alternatively, if the benefits of these programs are not fully capitalized into the price of the projects, then they can stimulate supply, thereby making rental housing more affordable. However, if the benefits are simply distributed from taxpayers through the government to developers, then there is little reason to expect the supply to increase.

The results of Gau and Wicks' study are tenuous but suggest that the benefits of these programs are fully capitalized into the price of the project and that rates of return are not positively affected. (The results for MURB are considerably stronger than for ARP.) As the authors emphasize, the results do not indicate the party to whom the benefits accrued -- that is, landowners in a fixed-supply housing market or tenants in a market where the supply of housing is virtually limitless at the market price. Nevertheless, they speculate that, in Vancouver and other metropolitan areas in Canada, most of the benefit probably accrues to landowners since the supply of land is fairly limited in many of these markets.

Another study reinforces the idea that ARP benefits probably were not conferred upon tenants. Dowler (1983) found that the average ARP rents in four urban markets were 13 per cent to 96 per cent higher than average market rents for the municipalities. He also reminds us that, when housing markets are tight, even the filtering effects from the supply of subsidized housing will not occur; that is, lower-priced

housing would not likely become relatively less expensive (Dowler, 1983, p. 48).

On the basis of this limited evidence, it must be concluded that construction subsidies are of limited, or at least uncertain, value in increasing the supply of housing and thereby making it more affordable. The effectiveness of subsidies certainly depends on the structure of the local housing industry as well as the tightness of the market. Moreover, such subsidies are not target-efficient in that they do not directly help the households with affordability problems.

The two supply-side programs (that is, public housing and construction subsidies) are similar to programs that have been simulated in the United States and whose effects, along with prototypical programs of income maintenance and housing allowances, have been analysed by the Urban Institute (Struyk et al., 1978).[38] Pure cost-benefit analyses of these alternative programs are not available, but there is some evidence on relative performance under simulated identical conditions (see Table 10).

This study evaluated housing programs according to the following indicators:

1. the average monthly subsidy
2. the participation rate of households eligible for the policy
3. the "earmarking ratio", that is, the ratio of the change in household housing expenditures to the subsidy received
4. the increase in housing consumption for participating households
5. the extent of control over the market price for housing services resulting from the policy (participants)
6. the increase in housing consumption for the target population

TABLE 10

Comparison of Various Housing Programs

Type of Program	Description of Program	Conditions for Participation
1. Housing allowance	Cash grants to households, earmarked for housing; 22 per cent of households eligible. Subsidies (S) determined under "housing gap" formula: $S = C^* - bY$ where C^* is the cost of dwelling, Y is household income, and b is tax rate or household contribution rate (set at .2 in the simulation).	Income test: $Y \leq C^*/0.2$. This implies income limits of $5,000 for non-elderly families and $4,000 for elderly families and individuals. Housing consumption requirement: families must occupy dwellings providing at least adequate level of service per month.
2. Major income-maintenance program	Unrestricted cash grants to 27 per cent of households. Transfer payments determined as $S = P - 0.6\ Y$, where P is the maximum payment and equals the 1969 poverty income definition (defined differently for non-elderly families and for elderly families and individuals). The 0.6Y term indicates that S is reduced by 60 cents for every dollar of additional income.	Income test: maximum incomes for non-elderly families, $6,250; for elderly families and individuals, $3,300.
3. Across-the-board subsidy for new construction	Subsidy (12 per cent of the cost of capital) available on all new residential construction.	No special requirements. Unit must meet building codes and, hence, provide at least adequate level of service per month.
4. Public housing	Conventional public housing. Enough new units built for 5 per cent of population. Household contributes 25 per cent of income to live in unit.	Income test: Household income cannot exceed 80 to 90 per cent of low to moderate income limits.

NOTE: All monetary figures are in 1970 dollars.

SOURCE: Adapted from Struyk et al., 1978, Table 17, pp. 93-95.

7. the extent of control over the market price for housing services resulting from the policy (target population)
8. the preservation of the base-year housing stock or the number of newly built units induced by program
9. the total cost of the program in relation to the cost of a housing allowance in the particular market ("moderate" means that the policy costs about the same as a housing allowance program)

The programs were assumed to have been in effect for ten years (ending in 1969-70) when their effects on the nine indicators were measured. The assumed target population for the program is lower-income households, in particular, those in the lowest income quartile. A subset of this group is the program participants; the effects upon the target population include direct and indirect effects. (There might be indirect negative effects upon the target population resulting from the direct effects on the participants; for example, higher prices generally might result from increased demand for low-income housing by participants.)

The comparisons are made for two types of markets: a rapidly growing market with an elastic supply of housing and a large proportion of minority groups (and, therefore, somewhat segregated submarkets); and a slowly growing market with an inelastic supply of housing and a low proportion of minority groups (meaning a market more open to all residents). Urban areas in Ontario fall between those two extremes so that the expected effects of a similar program in Ontario might be the "average" of the effects shown in Table 11.

The data in Table 11 lead to several conclusions. In both types of markets, public housing is expensive. It is expensive, however, in relation to housing allowances only in markets with an inelastic housing

TABLE 11

Alternative Programs under Sharply Different Market Conditions: Comparison of Effects[a]

City A High-Minority Rapid Growth	Housing Allowance	Income Maintenance	Construction Subsidies	Public Housing
A. Impact on participants[b]				
Average monthly subsidy	Moderate	High	c	Very High
Participation rate	High	High	c	High
Earmarking ratio[d]	Moderate	Low	c	e
Improvement in housing consumption	Moderate	Moderate	c	Very High
Control of price for housing services	High	High	c	e
B. Impact on target population[f]				
Improvement in housing consumption	High	High	Moderate	High
Control of price for housing services	High	High	High	e
C. Preservation of base-year housing stock[g]	Moderate	Moderate	Low	Moderate
D. Total program cost relative to cost of housing allowance[h]	----	Very High	Low	Moderate
City B Low-Minority Slow Growth				
A. Impact on participants[b]				
Average monthly subsidy	Low	High	c	Very High
Participation rate	High	High	c	High
Earmarking ratio[d]	High	Very Low	c	e
Improvement in housing consumption	Moderate	Moderate	c	Very High
Control of price for housing services	Low	Low	c	e
B. Impact on target population[f]				
Improvement in housing consumption	Moderate	Moderate	Low	High
Control of price for housing services	Low	Low	Very High	High
C. Preservation of base-year housing stock[g]	High	High	Moderate	Moderate
D. Total program cost relative to cost of housing allowance[h]	----	Very High	High	High

a The simulations for City A assume that producers of housing from the existing stock are comparatively responsive to changes in demand; those in City B reflect the opposite assumption. All results are for the 1969-70 period.

b "Participants" are households participating in the program.

c Participants are not explicitly defined for this program.

d This is the ratio of the change in housing expenditures to subsidy received.

e Housing expenditures of participants generally decline under public housing. The earmarking ratio is not defined because the household is simply given a unit of a certain quality of services; all of the subsidy produces more services. Because of the way in which public housing is valued, it is not possible to define a price per unit of housing services for public housing occupants.

f "Target population" is defined as the group eligible for participation under a national housing allowance program, with 22 per cent of households eligible.

g This is equivalent to the number of newly built units induced by the program.

h This is the cost for a program in this type of housing market, not the cost of a national program. A "moderate" classification means the program costs about the same as the housing allowance program.

SOURCE: Adapted from Struyk et al., 1978, Table 18, pp. 100-101.

supply and a surplus of housing in the lower-quality range (found in slow-growth cities), which can absorb the demand induced by a housing allowance. Public housing programs have a high participation rate and result in a very large improvement in the housing consumption of participating households and of the target population generally. Like all policies that confer large benefits on the target population, the benefits are concentrated since the program encourages construction of only a moderate number of new units. It is worth noting as well that the sociological objections to public housing were not considered in this analysis.

As one would expect, across-the-board subsidies for new construction effect relatively little improvement in the target population's housing consumption. Although these subsidies tend to moderate price increases, they are expensive when the supply of new housing cannot be expanded.

A large income-maintenance program is expensive compared to a housing allowance program, and, as was expected, only a small part of the subsidy is spent on housing. This type of program improves housing consumption at the same time that it fuels inflation in a slow-growth market. In general, income-maintenance programs work better in a fast-growing market.

Finally, housing allowances have much the same effect as income-maintenance schemes, except that the average monthly subsidy is lower and the earmarking ratio is higher. This difference reflects the program's narrow focus on housing, which promotes more housing consumption per dollar of benefit than a general income-maintenance program.

Finally, the comparative analysis indicates that the effects of a policy depend greatly upon local market conditions. As the authors of the study point out: "The theme of this volume is that a national

housing policy that applies the same housing program in all urban markets is a mistake because of vast differences in the direct and indirect effects produced by any major government program" (Struyk et al., 1978, p. 2). Thus in relation to rent regulation, this statement means that affordability problems in Ontario's diverse urban markets may not be equally well addressed by a province-wide set of rent guidelines and allowable rates of return.39

The lessons we can draw from our discussion of the relative effectiveness of various housing policies include the following:

1. If the policymaker's goal is to obtain maximum increases in people's well being as judged by the individual, then income-maintenance programs are the most successful program; if the goal is to induce people to consume more housing, other policies (for example, public housing and housing allowances) are more cost-effective. The choice of a goal is a political decision that should precede the choice of a policy.

2. Crude empirical evidence comparing public housing with rental supplements, which are similar to housing allowances, suggests that rent supplements are more cost-effective than public housing, although, in light of the quality of study, the conclusion must be very tentative. Indeed, an examination of Ontario data for 1983 suggests approximate parity between a 100 per cent rent supplement and "free" public housing.

3. Local market conditions can strongly influence the effectiveness of various policies. For example, the results of the Winnipeg study may be highly sensitive to the tightness of the market and to short- and long-run supply elasticity. The simulation results also highlight this sensitivity to local conditions, most particularly the capacity of the

housing market to expand and the extent to which the housing market is segregated.

4. Rent regulation falls among those policies that are ostensibly concerned with increasing households' access to housing. However, since the subsidies under rent regulation are financed implicitly by the owners of controlled units rather than by the government, such regulations may lead to a reduction in housing supply rather than the increase in supply resulting from the other four policies considered. The effects of rent regulation on supply depend upon a number of factors: whether new construction is exempt from regulation and, if so, for how long; whether even partial regulation (for example, of existing stock only) makes it appear risky to invest in the particular market; the extent to which regulation is binding (for example, with respect to rents or rates of return allowed); and the treatment of maintenance expenditures, which either exceed (under cost pass-through) or fall short of (if left unregulated) efficient levels.

5. Public housing and housing allowances are the most efficiently targeted housing programs. A general income maintenance program is not efficiently targeted on housing, but this is intentional (see (1) above). General construction subsidies and rent regulation are inefficiently targeted in that the direct benefits of the programs -- lower rents -- are not directed at households with affordability problems. With both policies, in fact, there is no assurance that rents are lowered -- at least on average. This more widespread distribution of the benefits of the policy can be seen as both an advantage and a disadvantage of the policy: it does not isolate and potentially stigmatize households with affordability problems, but it achieves this advantage by providing benefits to households that are not in need.

6. Rent regulation differs from the other policies in that the direct cost of the program is concentrated among a small group of citizens, that is, landlords of controlled units, whereas the costs of the other policies are, in general, financed from general revenues. There may be a means of shifting the concentrated burden of rent regulation to the general public through various compensatory policies. However, the design of such policies must not offset the effects of one distortion of the market by creating another.

An Alternative Policy

A compromise that would increase target efficiency and diffuse the cost of rent regulation is to retain the current system of rent regulation but to impose two new provisions: (1) that the regulation apply only to units rented by households with an affordability problem, as determined by a rent-to-income test improved in the light of the critique in Section II; and (2) that the landlord would be given a supplementary payment from the provincial government, with the amount of payment to equal the difference between the controlled rent paid by the household and the fair market rent as determined by a hedonic index of rents. Point (1) could be dropped if it would create too great a stigma for recipients. In that case, however, we should acknowledge that rent regulation is not an affordability policy.

Determination of the rent the landlord would receive could be based upon an analysis of rent for units with the same characteristics in the uncontrolled sector. Since landlords would receive fair market rent for their "controlled" units, there would no longer be a gap between controlled and uncontrolled rents, and comparable uncontrolled units

would provide suitable information for determining fair market rents for controlled units. With the data available from a rent registry, the estimation and regular updating of such an index would be straightforward. (The data collected by the rent registry would, of course, have to reflect the data needed for such an index.)[40]

This proposal thus provides a form of housing allowance or rent supplement paid to landlords. Such a plan might cause households to behave somewhat differently than a true housing allowance would in that, if the supplement goes to the landlord, there is virtually no incentive for households to search for the best bargain or to economize on certain housing services. Nevertheless, the plan would accomplish many of the same objectives and perhaps be more politically acceptable.

B. Housing Supply and Affordability Policy

It is beyond the scope of this study to examine the structure of the housing industry, but it is important to analyse how efficient an industry it is. If some segments of the housing industry are non-competitive, then the prices consumers ultimately pay are above the prices that a competitive market would establish and the quantities produced are probably smaller. As John Helliwell has stated, if one of the critical "nodes" in the production process produces under non-competitive conditions, then it is likely that prices are above, and quantities produced are below, competitive levels (Canadian Broadcasting Corporation, 1982, p. 2). To the extent that housing-related industries are made more competitive, the prices for their products should fall and output should increase. Thus, with one qualification, the enforcement of competition in housing-related industries should increase affordability and thus should be considered a policy to alleviate the housing

affordability problem. Enforcement may, however, be politically difficult; aside from Canada's traditional weakness in promoting competition, an enforcement policy would have to ensure competitive prices for labour and the rationalization of industries dominated by small businesses or producers and protected by tariffs and non-tariff trade barriers.

The one qualification to this general point is that, if there are sufficient economies of scale resulting from industry concentration, it may prove a poor trade-off to promote competition at the expense of rationalization (Green, 1980, pp. 85-89). Apart from this qualification, greater competition should mean increased affordability, other things being equal.[41]

A related point is that the speed with which housing supply responds to changes in demand has a fundamental influence on rent control's ability to improve affordability. Suppose rents increase because some outside force causes an increase in demand but the rent increase induces an immediate increase in supply and bring rents back to their pre-shock level or close to it. There would be no need for any market intervention to control prices since tenants would bear the burden of rising rents for a short period only. If, however, the supply response is likely to be very slow, there would be more reason for intervention to dampen prices until the supply increases enough to bring rents back to "reasonable" levels. As William Stanbury has argued:

> [Some] ... would argue that if a series of firms ... restricted output and raised prices, all that would happen is entry would occur and that would be competed away. Well, my reply to that is yes, maybe, but in what period of time? If it takes 10 or 20 or 30 years to weevil away all of that market power, they still get a huge benefit in the relatively short run. (Canadian Broadcasting Corporation, 1982, p. 4)

A recent study of Toronto analysed the speed of adjustment in that housing market (Biernacki, 1977). The average length of time from the issuance of a permit to the opening of an apartment building was found to be 15.53 months from 1966-76; this period is about four times longer than for single detached units and longer than the period estimated for the London (Ont.) housing market. In Toronto, construction began on average about two months (56 days) from the issuance of a permit but only about two-thirds of permits resulted in eventual starts. Construction took over a year on average. As Biernacki suggests, "political constraints" may delay production (1977, p. 21). While it would be better to have some perfectly competitive market against which to measure the Toronto experience, these estimates suggest that the market falls short of the ideal of instantaneous adjustment.

The speed with which the supply of housing increases in response to the rise in profits resulting from rises in rents is affected by the following conditions:

1. the time needed to determine whether the rise in rents is permanent;
2. the availability of capital for financing, which is a particular problem in the rental housing sector (Downs, 1983, pp. 49-51);
3. determination of the best location for increments to existing supply and the subsequent acquisition of land;
4. the availability of raw materials, labour, sub-contractors' services; during periods of full employment, both delays and higher costs will be likely;
5. obtaining the approval for construction and meeting various provisions of housing regulations (for example, zoning requirements and variances, building codes, housing codes, environmental standards).

Richard Arnott states succinctly the case for taking into consideration the various barriers to speedy market adjustment that exist in the housing market:

> The government taxes, subsidizes, or regulates almost every aspect of economic behaviour in the housing market. Analysing the effects of a housing market policy in vacuo, ignoring the myriad of other government programs, may result in a seriously misleading analysis. (1981, p. 33)

As part of his study of U.S. government regulation in the housing market, Stephen Seidel (1978) compiled a list of government regulations affecting various components of housing supply (see Table 12). He also categorized the various types of regulation with respect to the extent to which they increase housing costs (see Table 13). Although this information applies to the United States, it illustrates the extent to which the supply side of the housing market is not directed solely by market forces. Indeed, on the basis of his survey, Seidel concludes that, "... contrary to previous surveys in past years, government regulations were now considered to be the primary problem in doing business" (p. 38).

While this issue can only be raised here, it is nonetheless important to have this information in order to judge the usefulness of rent regulation. Unfortunately there seems to be little information available about supply responsiveness and the role of government regulation and market structure. The information needed would be not only a thorough industry study but also a study specific to the relevant housing markets since local ordinances and market conditions may have an important effect upon the of speed of response and cost of supply. For example, a recent study of the Oshawa-Whitby area suggests that the affordability problem there has been aggravated by local regulations and standards (Social Planning Council of Oshawa-Whitby, 1981).[42]

TABLE 12

Government Regulation Affecting the Cost of Housing in the United States

Level, Type of Regulation	Housing Cost Component Affected					
	Unimproved Lot	Land Development	Land Development Financing	Structural Materials and Labour	Construction Financing	Mortgage Financing & Settlement Costs
Federal government						
Clean Air Act	x					
Coastal Zone Management Act	x	x	x			
Consumer Product Safety Act				x	x	
Federal Noise Control Act				x		
Federal Water Pollution Control Act	x	x	x			
FHA and VA Mortgage Programs				x	x	x
National Flood Insurance Programs	x	x	x	x	x	
Occupational Health and Safety Act				x	x	
Real Estate Settlement Procedures Act				x	x	x
State government						
Building codes				x	x	
Coastal zone management	x	x	x			
Critical areas restrictions	x	x	x			
Land development acts	x	x	x			
Sewer moratoria	x	x	x			
Local government						
Bonding requirements			x			
Building codes				x	x	
Energy codes				x	x	
Engineering inspection		x	x	x		
Environmental impact review	x	x	x			
Mechanical codes				x	x	
Plat review		x	x			
Sewer connection approval and fee		x	x			
Shade tree permits		x	x			
Site plan review		x	x			
Soil disturbance testing		x	x			
Utility connection fees		x	x			
Water connection approval and fee		x	x			
Zoning	x	x	x			

SOURCE: Seidel, 1978, Exhibit 2.10, p. 20.

TABLE 13

Unnecessary Costs of Regulation, United States (N = 2471)

Type of Regulation	No Increase (less than 1%)	Significant Increase (1-5%)	Very Significant Increase (more than 5%)	Total*
Building codes	26.7	39.8	33.6	100.0
Coastal zone regulations	76.0	8.1	16.0	100.0
Energy codes	50.2	31.0	18.9	100.0
Environment impact statements	38.3	26.0	35.7	100.0
Floodplain protection	54.5	20.5	25.0	100.0
Mortgage finance requirements	30.1	40.4	29.5	100.0
State land development laws	44.2	23.2	32.6	100.0
Settlement costs	36.8	34.3	28.8	100.0
Subdivision requirements	7.6	20.3	72.1	100.0
Zoning	39.7	24.1	36.3	100.0

* May not add to 100.0 due to rounding.

SOURCE: Survey of the Home Building Industry, Center for Urban Policy Research, Summer 1976. Seidel, 1978, Exhibit 3.15, p. 38.

V. COSTS AND SECONDARY EFFECTS OF THE POLICY ALTERNATIVES AND RENT REGULATION

A. Secondary Effects

Rent regulation has a direct effect upon the transaction between tenant and landlord. The direct benefit goes to some tenants in the form of a lower rent, whereas the direct cost is imposed upon the landlords, who receive less rent. There are various other effects from this regulation that have already been discussed:

1. Some tenants are less likely to be "priced out" of an apartment.
2. The stigma of being considered a person with an affordability problem is less likely to arise from one's housing situation.
3. The affordability problems for households that do not acquire controlled apartments may be aggravated, and in the future there may be less housing available and therefore higher rents.
4. Many households that can afford market rents are provided with housing at below-market rates.
5. Prices in the rental housing market may be less volatile.
6. The supply of housing is likely to be reduced in the short run through a reduction in maintenance and in the long run through a reduction in new construction. (The latter effect depends upon the apparent risk of further control of rents, the treatment of new construction and maintenance under the regulation, and the bindingness of controls.)
7. Benefits are conferred on large groups of people at the expense primarily of a smaller group, with the probable result that it will be politically difficult to repeal the legislation.
8. Taxpayers have to pay for the administration of the regulations.

9. There are more incentives for discrimination in the housing market against various types of "undesirable" tenants who, ironically, tend to be the households with the most serious affordability problems.

The Ontario Ministry of Municipal Affairs and Housing has identified other effects of rent regulation (many of which are not quantifiable) that should be considered in developing a policy. One is that rent regulation increases the riskiness of financing rental housing, and thus financial institutions may be less willing to lend money to housing investors. This reluctance may manifest itself in higher denial rates by lenders or higher interest rates (Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 98).

There are also costs of complying with the regulations: filing reports; following proper procedures for rent increases and exemptions; claiming upaid rent or security deposits; making evictions; attending hearings; and filing for various types of rent increases and exceptions. Large landlords may be able to comply with the regulations at low marginal cost, but tenants and small landlords may find it a burden (Ontario Ministry of Municipal Affairs and Housing, 1982b, p. 100).

By creating enforced bargains in the housing market, rent regulation tends to cause a mismatch between tenants and the housing they need. Tenants consume more housing than they need if it is available at a below-market price. Moreover, since controlled units are scarce, tenants tend to keep controlled units even as their housing needs change, thus limiting the mobility of the population (for example, labour mobility as considered by Howenstine (1977, p. 23)). Moreover, the extent to which controlled units are prized suggests that people may devote more time to their search (in the hope of finding a controlled unit) than they would

in an unregulated market. Thus, rent regulation interferes generally with household location decisions.

Because of the opposition to rent regulation and the aforementioned distortions in the choices available to households, rent regulation may lead to various types of illegal activity, including general problems of compliance as well as various strategies to avoid the regulations such as key money, furniture sales, bribes, and finder's fees. Historically, rent regulation, like many forms of economic regulation, has not promoted respect for the law.

Owners of rental units also have an artificial incentive to convert rental units to ownership units, thus further aggravating the supply problem. This has occurred in Ontario, despite bylaws intended to prevent it (Smith and Tomlinson, 1981).

Finally, rent regulation tends to foster various other forms of legislation to counter its effects, since it is often easier to pass new legislation, which usually causes more market distortion, than to repeal the offending legislation. Counter-policies include anti-conversion laws (as mentioned above) and various construction subsidies -- such as ARP and MURB.[43]

The other policies considered in the previous section will also tend to have various intended and unintended effects.

The work incentive issue surrounding the guaranteed income idea has already been discussed. There has also been some consideration of the effect that payments that vary by location may have upon incentives to migrate. Finally, it has been suggested that a true income floor may reduce the anxiety within low-income households, thereby leading to greater domestic harmony. In addition, it may allow one spouse to stay

home to look after children, or alternatively, it may allow the recipients to increase their human capital by returning to school.

We have also considered some of the sociological issues raised by the traditional kinds of public housing. In addition, it may be argued that such public programs promote the existence of suppliers who become heavily dependent upon such programs and thus exert pressure for them to continue, even though they may have outlived their usefulness. The same can be said of various construction subsidy programs: once the subsidies have been provided, it becomes difficult to remove them. Moreover, given that many such government housing programs alter price signals that reflect relative scarcities of both housing production inputs and of the various types of housing, there is serious question as to the extent to which they promote efficiency in production.

Finally, analysts have suggested that housing allowances may have some of the same effects as a guaranteed income, for example, with respect to work incentives. This objection is particularly cogent when housing allowances are one of several allowance programs that, together, provide a guaranteed income with an unintentionally high cumulative marginal benefit reduction rate (see note 33). However, a housing allowance should provide better housing for low-income households along with the social benefits resulting from such an improved environment.

One of the most serious objections to housing allowances is that they tend to have an inflationary effect upon local housing markets. The discussion in the previous section suggested that this was not a problem in the housing allowance experiments. Indeed, an examination of Table 12 shows that, in a growing local market with a responsive housing industry, none of the policies considered would have an inflationary effect upon housing prices either for participants or for the target population

generally. In slow-growth areas, however, both housing allowances and income-maintenance programs tend to have inflationary effects. Moreover, since a large-scale (for example, Ontario-wide for all low-income households) housing allowance program has never been used, it would be premature to conclude that such a program would not be inflationary. Again, cyclical and local market conditions have a considerable bearing upon such effects.

B. Cost Burdens

The cost of the four alternative policies considered in Section IV is borne primarily by taxpayers generally. This is considered desirable if the policy reflects the public will that the benefits from such policies should be provided to deserving recipients. An objection to this allocation of cost may be that the society does not support such redistribution or that redistribution should be done at some level other than the one being used (for example, federally rather than provincially; provincially rather than locally). It is also important that the policy consider the donor's wishes with regard to the restrictions on the recipient's choices.

The direct cost of rent regulation, on the other hand, is paid primarily by the landlords in the controlled sector of the housing market unless there is some form of compensation; as discussed previously, the benefits may accrue not only to tenants but to other landlords and homeowners. However, it is apparent that an additional burden may be placed upon all property-taxpayers in the jurisdiction. Sternlieb and Hughes (1979) have argued convincingly that, because rent regulation reduces the value of controlled buildings, the resulting decline in assessment and

tax revenue from controlled buildings must be made up by other taxpayers. Given the redistributive and affordability goal of rent regulation, it would seem more consistent to impose its costs in a manner similar to policies with similar goals such as housing allowances, namely, on taxpayers generally. The plan proposed in Section IV would allow such a sharing of the burden. Moreover, with regard to the particular issue of the allocation of the property tax burden, assessments in Ontario are based upon the capitalized value of fair market rents, not controlled rents. Although the resulting estimates are only approximations of what the market value of properties would be in the absence of regulation, the procedure should alleviate the problem of redistribution of the property tax burden. However, it increases the uncontrolled landlords' property tax burden.

VI. CONCLUSION

The concept of affordability is slippery: it can be defined precisely only by measurement, and current measures are inadequate for various reasons. If an equitable, effective policy for addressing the housing affordability problem is to be developed, a more precise measurement of affordability must be devised. Given the shortcomings of existing methods of measuring the affordability problems, one can venture an estimate that perhaps 15 to 30 per cent of Ontario households have a housing affordability problem. Not surprisingly, this figure is roughly equivalent to the present level of poverty in the province since low income usually results in problems of affordability in both housing and other markets.

One's approach to the affordability problem will depend heavily upon one's attitude toward the operation of markets -- and the desirability of letting markets operate freely -- and the concept of private property. A market-oriented analysis will consider affordability to be a problem of either income distribution and poverty or of the responsiveness of the housing industry. An alternative approach to the problem is that there is an affordability problem because there is a faulty division of property rights between landlords and tenants.

The effectiveness of a policy directed at increasing housing affordability depends not only on the rules that describe the policy but also on their enforcement and on the penalties for non-compliance. If any part of the process is weak, then the policy itself is weak.

Policies may be enacted for a number of reasons, only one of which is the failure of the market to work. Other reasons are, first, a widespread agreement that market outcomes are too severe and, second, the

ability of particular interest groups to wield more power than their opposition, which may be too diffuse to be effectively organized or stands to lose too little per capita to make opposition worthwhile or has too few votes.

Two principles will have a profound effect upon the choice of a policy to address the affordability problem. First, one must decide who is intended to benefit from the policy. For a given budget, income assistance provides the greatest increase to the well-being of the recipients. If the voters as donors trust the recipients to know what is best for them, then the voters will also be more satisfied. However, the donors may not trust the recipients to make the best use of the contributions, in which case donors' welfare is increased by making contributions conditional on their being used for certain purposes. In North America, such contributions have traditionally been conditional.

Second, one must determine how target-efficient a policy should be. Greater target efficiency means that the distribution of benefits from a policy is determined by a test of need: those with the greater need get the greater benefit. The primary objection to this principle is that it isolates, and therefore stigmatizes, the needy. The cost of such stigma must be weighed against the cost of less target efficiency.

Most policies for addressing the affordability problem have been directed toward the demand and supply side of the market; rent regulation is, instead, oriented toward one market outcome, namely, the price of housing. By regulating prices, it can be expected to affect both the quantity of housing services available through its effect on construction and maintenance and the quantity of housing services demanded. If the housing market tends to be reasonably competitive, a distortion of the market price will tend to distort quantity of housing supplied. Of

course, that depends heavily upon the form regulation takes. In particular, effects on supply will depend upon the treatment of maintenance costs and new construction, the effects of regulation upon investors' perceptions of the riskiness of returns on their investments, and the bindingness of the particular regulation.

One of the most effective housing affordability policies may involve a careful study of the housing industry to see whether it is competitively organized in all aspects and/or whether it is so regulated that supply does not respond quickly to changes in demand (especially those resulting in higher prices). The value of regulation must be weighed against its effect upon the speed with which the market operates.

At present there is no evidence that rent regulation can solve the affordability problem in the long run. This is partly due to our failure to have good measures of affordability and partly due to our lack of data on long-run effects. Limited evidence from the Ontario experience suggests that most of its benefits have gone to households that do not have affordability problems. In addition, although it is too early to tell, the alleviation of some households' affordability problems in the short run may mean more serious and perhaps more widespread affordability problems in the longer run if the supply of housing falls because investment in housing has become less profitable. Moreover, unlike virtually all other affordability policies, most of the funding under current legislation is not broadly based among the taxpayers of the relevant community but is concentrated among the owners of rental housing in the controlled sector and, to a lesser extent, property taxpayers, who may have to increase their contributions to offset the reduction in revenues from devalued rental housing.

Thus, the distributional benefits and burdens of rent regulation compared to most other housing policies are particularly troublesome.

A form of rent regulation that might be more efficiently targeted toward problem households would allow only the tenants with affordability problems to pay the regulated rent. The tenant would pay the regulated rent or (for example) 25 per cent of its income, whichever was greater, and the government would pay the landlord the difference between that amount and the fair market value. This plan would maintain rent regulation, concentrate the policy upon the affordability problem, allow investors to receive fair market returns on their investments, and shift the burden of an affordability policy to the general taxpayer. Such a program might be expensive, but at least the expense would be borne by all the taxpayers rather than landlords and, to a lesser extent, property taxpayers. Moreover, it would make it more difficult for voters to ignore the true costs of addressing the affordability problem.

Such a policy embraces the concept of the conditional contribution by the donor, but it favours target efficiency over avoidance of stigma.

What if the alternative to rent regulation is simply to rely upon the "free market" without even so much as streamlining the housing industry or revamping its regulations? That is, what if our choice is not between rent regulation and some alternative policies, one of which may be ideal, but between rent regulation and laissez faire? If this were the choice, then many would agree that inefficient redistribution for at least a short while is better than no redistribution at all. However, there is much evidence that that is not the choice before us: all levels of government have addressed the affordability problem for decades, either by income maintenance or benefits in kind of various amounts. Although the government cannot protect its citizens from all

the risks of the market, it is appropriate to develop a policy response to selected affordability problems, particularly in markets for essential commodities whose cost absorbs a large part of people's disposable incomes. However, it is also important to strive for a careful assessment of the extent of the problem as well as a thorough evaluation of alternative policies. We should also be clear about the role mitigation of affordability problems plays in our choice of policy; moreover, this role will be shaped somewhat by the concept of affordability we adopt. The adoption of rent regulation should be an <u>outcome</u> of such analysis, not a condition preceding it.

NOTES

1. In such countries -- Canada and the United States, for example -- government intervention is occasionally "deep" in that market outcomes are virtually prohibited (e.g., the heroin market, many public utilities, and national defence) but usually "shallow" (e.g., legislated rules for entry into a profession and various forms of government aid to agriculture).

2. The true nature of the Canadian economic system is a matter of opinion, but various public documents and statements have claimed that it is a market system: "Our ... guiding principle is that the Canadian economy should remain a predominantly market system ... in which the bulk of productive and distributive activity is carried out by the private enterprise units responsive to consumer demand ..." (Senate Committee on National Finance, cited in Hayek et al. (1975), p. xiv).

3. Various authors have explored such "markets" for regulation. See, for example, Olson (1982), Posner (1974), and Stigler (1971).

4. Note that the restriction is on the money paid. Aside from questions of the efficacy of the restriction, which will be discussed later, this form of restriction is already "incomplete" in that the seller may demand some non-pecuniary supplement to money in the case of price "ceilings" or may be required to provide some supplementary goods or services in the case of a price "floor".

5. The term does not appear in The Encyclopedia of Philosophy, for example.

6. The discussion assumes that the reader has a knowledge of elementary economics. Readers unfamiliar with the various terms used in the text or wishing a fuller explanation of their meaning and relevance should consult an introductuctory economics text such as Lipsey, Sparks, and Steiner, Principles of Economics (4th Edition, 1982) or Samuelson and Scott, Economics (11th Edition, 1980).

7. For example, in their study of Ontario households, Miron and Cullingworth (1983) had annual income data only for the year preceding that for which they had monthly rent observations; moreover, they had rent data only for the month preceding the month of the survey (viz., Statistics Canada's Household Facilities and Equipment microdata file). Thus, their ratio assumed that (1) last month's rent was the same as the monthly rent throughout the year of the survey and (2) last year's gross household income was an adequate proxy for this year's gross household income. In addition, they excluded households that could be considered to have their rent subsidized in some way (for example, by government or relatives) and whose rent was thus below the market rent. Obviously, the ratio is difficult to perfect; various issues raised by its use are discussed in Section II(C) below.

8. The Metropolitan Toronto Planning Department (1980) used this approach in an analysis of households in the Toronto area; the study is discussed in Section II(B).

9. There is certainly no guarantee that the higher costs imposed by many local building codes or other regulations lead to higher-quality housing except perhaps in a tautological sense.

10. Generally, the market does not provide insurance against price fluctuations because such fluctuations and the corresponding risks are not independent of each other and thus reflect a phenomenon called catastrophic risk: the events insured against (for example, rent increases) tend to happen to the insured parties (in this case, all tenants) all at once so that an insurance company would have difficulty diversifying its risk. The existence of such risks is a primary reason why the various forms of income insurance -- UI, for example -- are provided by the government as the "insurer of last resort".

11. Miron and Cullingworth used Statistics Canada's Household Facilities and Equipment (HIFE) micro-data file in making their estimates. In the sample of Ontario households, they were able to identify those households that rent rather than own and to approximate, among renters, those who are entirely responsible for their own rent and which pay a market rent. Those are the unsubsidized renter households (URH).

12. Steele and Miron argue that only at income levels below twice the poverty line (approximately median income in Canada) should there be concern that households spending more than a reasonable proportion of income on housing will have too little income left to cover their other needs (p. 9). Moreover, there is some empirical evidence that virtually all households facing an affordability problem according to a rent-to-income criterion have poverty or near-poverty level income (Miron and Cullingworth, 1983, pp. 112-114). Thus, it is reasonable to focus upon households that have below-median income and spend more than a reasonable proportion of income on housing.

13. While the data in Table 4 indicate that the number of households with affordability problems has been declining over the period during which Ontario has had rent regulation, Steele and Miron are reluctant to attribute any cause-effect relationship to this (1984, pp. 17-18, 43-62) except, perhaps, in the case of elderly households (p. 57).

14. One way to see this using elementary economic tools is to consider the household's trade-off between housing and the set of all other goods where the trade-off is characterized by an indifference curve for a given level of household "well-offness". Assume that the household's current budget allows it to attain this level. Over time, the price of housing may rise, but, if the price of the set of all other goods falls "enough", then the household may remain at the same level of satisfaction, even though its rent-to-income ratio has risen. If the "other goods" price is not falling or is rising, we need to consider whether income is rising rapidly enough to allow a

household's welfare to remain constant or to grow. However, a rising rent-to-income ratio is not inconsistent with such improvements.

15. One should be careful about relating vacancy rates to affordability. While a "below-equilibrium" vacancy rate (i.e., less than 2-3 percent) suggests excess demand and price, or rent, increases, there is no necessary relationship between such a condition and income changes: incomes may be rising faster than rents so that affordability is becoming less of a problem. Also, since markets may not tend toward clearing rapidly, if at all, high vacancy rates may reflect high, "hard-to-afford" rents which somehow do not tend to fall (e.g., due to owners' fears that "low rents" will be perceived as "low quality"). Moreoever, there is no relationship that one can expect to exist among vacancy rates, the distribution of rents, and the distribution of incomes. It is simply suggested here that vacancy rates are <u>one</u> factor one should consider in isolating affordability problems primarily because very low vacancy rates have tended to mean increasing affordability problems for certain types of households (esp. those on fixed incomes).

16. Griliches provides a useful definition of, and rationale for the use of, hedonic price indices:

> The "hedonic," or, using a less value-loaded word, characteristics approach to the construction of price indexes is based on the empirical hypothesis . . . which asserts that the multitude of models and varieties of a particular commodity [e.g., housing] can be comprehended in terms of a much smaller number of characteristics or basic attributes of a commodity [e.g., size, location, number of bedrooms, amenities] . . . and that viewing the problem this way will reduce greatly the magnitude of the pure new commodity or "technical change" problem, since most (though not all) new "models" of commodities may be viewed as a new combination of "old" characteristics. In its parametric version, it asserts the existence of a "reasonably well-fitting" relation between the different models and the level of their various but not too numerous characteristics. If one views the commodity as an <u>aggregate</u> of individual components or characteristics, there is no reason to expect that this relationship between the overall price of the bundle and the level or quantity of the various charactistics will remain constant. Both the relative and the absolute prices of the various components may change. (Griliches, 1971b, p. 4)

One of the simplest forms of an hedonic index is a linear regression equation relating the price of a commodity (e.g., rent for an apartment) to the various characteristics of the apartment as independent variables; the coefficients of these variables are the implicit unit prices for the particular characteristics.

17. There is an extensive literature on hedonic price indices, both generally and in housing markets. For example, see Griliches (1971a) and Kain and Quigley (1975).

18. The zero price of the locational characteristic for a controlled unit may seem odd. However, an hedonic index in a controlled market should be expected to exhibit at least some below-market prices: if rent control is binding, then some characteristics must be priced "below market," or the rent itself cannot be below market (Marks, 1984). In this case, the hedonic estimation indicated that the west side location was valued at zero -- below market -- in controlled units.

19. At least two studies of housing vouchers have acknowledged the distinction between the effects of transitory and permanent income on the demand for housing and have estimated permanent income elasticity (Cronin in Struyk and Bendick, 1981; Friedman and Weinberg, 1982), but one of them does not proceed to explain how this behaves differently from current income elasticity (Friedman and Weinberg, 1982).

20. This problem is analogous to what has been termed the accounting period problem in the literature on the measurement of poverty (Klein and Asimow, 1970; Bawden and Kershaw, 1971).

21. See Miron's and Cullingworth's Table 7.3 for detail. Two comments are in order. First, it would be useful to know what kinds of households have high ratios and non-poverty incomes. It makes a big difference whether such households are single adults or large families. Second, the numbers in Miron's and Cullingworth's Table 7.3 do not always add, so that it is difficult to know exactly how income and high ratios relate to each other.

22. This discussion assumes that the policy does not involve problems of conflict of laws or constitutionality. An assumption of the latter has not always been realistic in the case of Ontario rent regulation, particularly its attempt to vest the Residential Tenancy Commission with the power to order evictions or compliance with orders under the Residential Tenancies Act (Miron and Cullingworth, 1983, p. 17). For a discussion of equity in the composition of rent control, see Lett (1976b).

23. A recent example of regulation that does not contain such incentives is Ontario's environmental protection laws (Globe and Mail, March 2, 1984, p. B-10). Minimum wage laws in the United States have been found to suffer from similar problems of a lack of incentive for compliance (Ashenfelter and Smith, 1979).

24. The following story by Pareto illustrates the point nicely:

> Let us suppose that in a country of thirty million inhabitants it is proposed, under some pretext or other, to get each citizen to pay out one franc a year, and to distribute the total amount amongst thirty persons. Every one of the donors will give up one franc a year; every one

> of the beneficiaries will receive one million francs a year. The two groups will differ very greatly in their response to this situation. Those who hope to gain a million a year will know no rest by day or night. They will win newspapers over to their interest by financial inducements and drum up support from all quarters. A discreet hand will warm the palms of needy legislators, even of ministers . . . On the other hand, the despoiled are much less active. A great deal of money is needed to launch an electoral campaign. Now there are insuperable material difficulties militating against asking each citizen to contribute a few centimes. One has to ask a few people to make substantial contributions. But then, for such people, there is the likelihood that their individual contribution to the campaign against the spoliation will exceed the total amount they stand to lose by the measure in question . . . When election day comes, similar difficulties are encountered. Those who hope to gain a million apiece have agents everywhere, who descend in swarms on the electorate, urging the voters that sound and enlightened patriotism calls for the success of their modest proposal. They will go further if need be, and are quite prepared to lay out cash to get the necessary votes for returning candidates in their interest. In contrast, the individual who is threatened with losing one franc a year--even if he is fully aware of what is afoot--will not for so small a thing forego a picnic in the country, or fall out with useful or congenial friends, or get on the wrong side of the mayor or the prefet! In these circumstances the outcome is not in doubt: the spoliators will win hands down. (Pareto, 189b, pp. 115-116)

25. We have omitted discussion here of the numerous vagaries in the law that result from the use of cost pass-throughs, hardship allowances, and allowed rates of return. Arnott (1981) touches upon some of these, but a thorough analysis of the problems introduced by possibilities for "creative" accounting, financing, and other businesses practices is beyond the scope of this discussion.

26. Miron and Cullingworth (1983) consider the problem households in Ontario to be the three mentioned plus single adults under 65. Single adults and perhaps the elderly would tend not to be affected as much as the poor and single parents, except through racial and ethnic discrimination.

27. The best example illustrating this problem and other disadvantages tenants may face in a courtroom is the Detroit Landlord-Tenant Court, which was organized in Michigan in 1968 to allow tenants more defences against summary eviction procedures. The problems of this court were:

    1. the significantly lower proportion of legal representation among tenants in relation to landlords and the resulting courtroom advantage implicitly conferred upon the legally more sophisticated landlords;

2. the related failure of tenants to raise and pursue available defences against landlords' claims; and

3. an apparent bias by the court in favour of landlords resultiong from a greater sense of class and professional kinship with lawyers and landlords than with tenants (Mosier and Soble, 1973, pp. 9-70).

While these findings are enlightening, the third finding is somewhat speculative.

28. As mentioned previously (p. 45), target efficiency--identifying and servicing some target population at the lowest cost per unit of benefit--may conflict with other policy goals such as the avoidance of stigma for a target population (cf. the discussion below regarding public housing). However, such a goal may also present other problems. For example, it can be argued that identifying a target population requires the specification of eligibility criteria which in turn increases the likelihood that eligibles will perceive the benefit as an entitlement. In addition to the problem that the existence of such criteria may induce people to distort their behaviour in order to become eligible, there is also the possibility that more people will demand the benefit than if the program is not targeted, and the cost of the program will increase. In addition, the identification of such a population may contribute to the development of a group within society that becomes dependent upon such targeted benefits.

29. Such systems of income security have been studied extensively in Canada and the United States during the past twenty years (Orr, Hollister, and Lefcowitz, 1971; Pechman and Timpane, 1975; Moffitt and Kehrer, 1981) and have been the basis of major federal initiatives toward reform of the welfare systems in both countries (Moynihan, 1973; Burke and Burke, 1974; Health and Welfare Canada, 1973).

30. We should be careful to note here that the locational preferences of households with an affordability problem -- either general or specific to housing -- need not, and perhaps should not, be honoured by the policymaker. It is not at all clear that a guarantee of a poverty-level benefit means an income appropriate for the household's current location. Perhaps the benefit should provide an inducement to move to an area with a lower cost of living as well as an inducement to work. One could even push this argument into the area of efficient household formation, but the ethical ice gets very thin at that point.

31. If the household has no other income, it receives a $5,000 benefit payment. If it earns, say, $1,000, its benefit is reduced by $500 (50 per cent) and its total income is $5,500 ($1,000 earnings plus $4,500 benefit). If its earnings are $7,000, its benefit drops to $1,500 ($5,000 less 50 per cent of $7,000), and total income is $8,500. When earnings equal $10,000, it receives no benefit.

32. While there is not adequate space here to discuss the role trust plays in welfare policy and poverty, it is important to contemplate this issue since it is fundamental to one's determination of the proper basis for and role of policy-making in a democratic society. For a good example of the political argument in favour of benefits in kind over cash -- and a hint of the lack of trust (or what some would call "just being realistic") that often accompanies such arguments -- see Coleman (1984).

33. It is worth noting here that, in considering the tax -- or benefit reduction -- rates for programs such as housing allowances, one must be cognizant of benefit-reduction rates imposed by other programs. We care about such rates not only for each program in isolation but also for the set of programs for which a household may be eligible. While a single rate may be incentive-preserving, the rates may be cumulative (e.g., several programs reduce benefits as earned income rises) so that, together, they impose a confiscatory benefit reduction. For a discussion of the problem of cumulative tax rates, see Hausman (1972).

34. Housing Allowances, or vouchers, may soon be moving from experimental status to actual policy. A recent report indicates that the Reagan Administration supports the voucher idea strongly -- certainly relative to public housing -- and plans to seek $1.5 billion in its FY85 budget for HUD for vouchers over the next five years (Boyd, February 19, 1984).

35. For a discussion of the search, or "shopping" effects of various housing allowance plans, see Friedman and Weinberg (pp. 115-124); Rossi (pp. 161, 162) and Leigh (pp. 173-77) in Bradbury and Downs (1981); and Cronin/Rasmussen (pp. 118-121) and Cronin (pp. 134-147) in Struyk and Bendick (1981).

36. Moreover, it would be consistent with the avoidance of targeting to expand the coverage of all sorts of policies that are currently aimed at certain groups. For example, perhaps we should universalize the idea of marketing boards so that all producers can have a supply management marketing board to control the amount of the product that is offered on the market. Each dry cleaner would have a quota of cleaning that it could take in, and, with "proper" management, we could expect the value of such quotas to rise along with the price of dry-cleaning and the reduced supply of dry-cleaning services. Perhaps we should also have universal tariffs so that Canadian consumers can buy only Canadian products.

In addition, voters and/or their representatives may prefer policies which do not involve direct outlays and for which the costs are not explicit -- especially if those costs are shifted to some groups in society as opposed to the taxpayer:

> ... many taxpayers are probably not as negative toward a program that does not involve large, overt government expenditures. In effect, the inefficiency of rent review in transferring assistance to those in need, may be the price society pays for its perceptual preferences for

indirect transfers. (Ontario Ministry of Municipal Affairs and Housing, 1983, p. 123)

Thus, the popularity of policies such as rent regulation over direct policies such as housing allowances may be based more upon what it hides -- affordability problems and costs of the policy -- than upon its direct benefits. The value of hiding such issues may more than offset the costs of its inefficient distribution of benefits.

37. The filtering process can be explained as follows. Imagine that the stock of housing in a given market can be ranked by quality from highest to lowest. An injection of new housing supply at any point along the spectrum can be expected, cet. par., to lower the price of housing of that quality with the result that a number of households are able to upgrade the quality of their housing. The houses they leave then become available to households that had been consuming lower-quality housing so they, too, move up and leave housing of somewhat lower quality. Some analysts expect that the chain of moves initiated by the initial injection of housing supply (perhaps at the top end of the spectrum) results eventually in housing becoming available and affordable to low-income households that is better than the housing they would have consumed in the absence of the injection.

38. The public housing programs in the two countries have generally been similar, but there have been differences in their private rental programs:

> Both countries utilize private mortgage funds in these programs. Whereas Canada has provided grants, then interest-free secondary mortgage loans and now payment reduction loans on private ARP units, no capital subsidies are available in comparable U.S. programs. (Central Mortgage and Housing Corporation/U.S. Department of Housing and Urban Development, 1979, p. 32)

In addition, such assistance programs are probably more oriented toward needy households in the United States, whereas, in Canada, "ARP is viewed as a housing production program rather than social housing" (Central Mortgage and Housing Corporation/U.S. Department of Housing and Urban Development, 1979, p. 32). The Urban Institute policy simulation closest to ARP is an across-the-board subsidy for new construction consisting of a reduction in mortgage interest rates. Neither country has universal housing allowances or negative income taxes.

39. A lesson that is clearer from the full range of programs analysed with the Urban Institute model (not shown) is that it is wise to stimulate both sides of the market rather than only one. For example, a housing allowance joined with rehabilitation subsidies is one of the most effective policies in the slow-growth market.

40. This should not be a serious problem. For example, the data used in the hedonic analysis of the effect of British Columbia rent control in Vancouver (Marks, 1984) was taken from landlords' regular reports to the B.C. office of the Rentalsman.

41. This is not say that the rental housing market is a good example of a perfectly competitive market. However, it is worth noting here that the numerous studies that have addressed the issue of market power among the immediate suppliers of rental housing services -- namely, landlords -- have found no evidence of effective market power (Sternlieb, 1966; Miron and Cullingworth, 1983, pp. 144-9; Robinson, 1979, pp. 93-94). At that stage, the market appears to be competitive.

42. While the issue of market efficiency can only be mentioned here, it is the subject of another study being done for the Commission.

43. In addition, while a complete consideration of the topic would take us too far afield, options for rent decontrol require as much scrutiny as the analysis of control itself. The best existing discussion of the topic for Ontario is found in Arnott (1981).

REFERENCES

Aaron, Henry J., and von Furstenberg, George M. 1971. "The Inefficiency of Transfers in Kind: The Case of Housing Assistance." Western Economic Journal 9(June):184-191.

Arnott, Richard. 1981. Rent Control and Options for Decontrol in Ontario. Richard Arnott with the assistance of Nigel Johnston. Policy Study Series. Toronto: Ontario Economic Council.

Ashenfelter, Orley, and Smith, Robert S. 1979. "Compliance with the Minimum Wage Law." Journal of Political Economy 87:2(April):333-350.

Auld, Douglas A. L., and Miller, Carl. 1982. Principles of Public Finance: a Canadian Text. 2nd ed. Toronto: Methuen.

Ault, Richard W. 1981. "The Presumed Advantages and Real Disadvantages of Rent Control." In Rent Control: Myths and Realities, edited by Walter Block and Edgar Olsen, 55-81. The Fraser Institute Housing and Land Economic Series, no. 7. Vancouver, British Columbia: Fraser Institute.

Bawden, D. Lee, and Kershaw, David. 1971. "Problems in Income Reporting and Accounting." In Income Maintenance: Interdisciplinary Approaches to Research, edited by Larry L. Orr, Robinson G. Hollister, and Myron J. Lefcowitz, 258-267. Chicago: Markham Publishing Company.

Biernacki, C. M. 1977. Tests of the Temporal Sensitivity of the Toronto Housing Market. Major Report, no. 12. Toronto: Centre for Urban and Community Studies, University of Toronto.

Boyd, Gerald M. "'Vouchers' - Key to Housing the Poor?" New York Times, 19 February 1984, vol. 133, sec. 4, p. E4.

Bradbury, Katherine L., and Downs, Anthony, eds. 1981. Do Housing Allowances Work? Brookings Studies in Social Experimentation. Washington, D.C.: Brookings Institution.

Bruce-Briggs, B. 1976. "Rent Control Must Go." New York Times Magazine, 18 April 1976, pp. 19-20, 24, 26, 28, 31.

Burke, Paul; Casey, Connie; and Doepner, Gerd. 1981. Housing Affordability Problems and Housing Need in Canada and the United States: A Comparative Study. Canadian-United States Bilateral Urban Program, Report no. 3. [Ottawa]: Canada Mortgage and Housing Corporation and U.S. Department of Housing and Urban Development.

Burke, Vincent, J., and Burke, Vee. 1974. Nixon's Good Deed: Welfare Reform. New York: Columbia University Press.

Canada. Health and Welfare Canada. 1973. Working Paper on Social Security in Canada. 2nd ed. Ottawa: Department of National Health and Welfare.

Canadian Broadcasting Corporation. 1982. "Ideas: Cornering the Market: Parts I-IV." Toronto, Canadian Broadcasting Corporation.

Central Mortgage and Housing Corporation and United States Department of Housing and Urban Development. 1979. Multi-family Federal Rental Housing Assistance Programs in Canada and the United States: A Comparative Study. Ottawa: Central Mortgage and Housing Corporation.

Clayton, Frank, and Lampert, Greg. 1982. "The Troubles of Rental Housing." Policy Options 3:3(May-June):55-57.

Coleman, Thomas E. 1984. "Don't 'Cash Out' Food Stamps." New York Times, 26 February 1984, vol. 133, sec. 4, p. E17.

Cronin, Francis J. 1981. "Consumption Responses to Constrained Programs." In Housing Vouchers for the Poor: Lessons from a National Experiment, edited by Raymond J. Struyk and Marc Bendick, Jr., 129-160. Washington, D.C.: Urban Institute Press.

Cronin, Francis J., and Rasmussen, David W. 1981. "Mobility." In Housing Vouchers for the Poor: Lessons from a National Experiment, edited by Raymond J. Struyk and Marc Bendick, Jr., 107-128. Washington, D.C.: Urban Institute Press.

Davidson, Harold A. 1978. "The Impact of Rent Control on Apartment Investment." The Appraisal Journal 46(October):570-580.

Dennis, Michael, and Fish, Susan. 1972. Programs in Search of a Policy: Low Income Housing in Canada. Toronto: Hakkert.

Dowler, Robert G. 1983. Housing-Related Tax Expenditures: An Overview and Evaluation. Major Report, no. 22. Toronto: Centre for Urban and Community Studies, University of Toronto.

Downs, Anthony. 1983. Rental Housing in the 1980's. Washington, D.C.: Brookings Institution.

Economic Council of Canada. 1967. Fourth Annual Review: The Canadian Economy from the 1960's to the 1970's. EC21-1/1967. Ottawa: Queen's Printer.

Edwards, Paul, ed. 1967. The Encyclopedia of Philosophy. 4 vols. New York: Free Press; London: Collier Macmillan.

Falk, Karl. 1982. "Housing Allowances in Theory and Practice." Habitat 25(4):10-15.

Fallis, George, and Smith, Lawrence B. 1984. "Uncontrolled Prices in a Controlled Market: The Case of Rent Controls." American Economic Review 74:1(March):193-200.

Feins, Judith D., and Lane, Terry Saunders. 1981. How Much for Housing? New Perspectives on Affordability and Risk. Cambridge, Massachusetts: Abt Books.

Friedman, Joseph, and Weinberg, Daniel H. 1982. The Economics of Housing Vouchers. Studies in Urban Economics. New York: Academic Press.

___. 1983. The Great Housing Experiment. Urban Affairs Annual Reviews, vol. 24. Beverly Hills: Sage Publications.

Gau, George W., and Wicks, Anne P. 1982. Impact of the ARP and MURB Programs on the Vancouver Housing Market. Canada Mortgage and Housing Corporation external research program report. Ottawa: Canada Mortgage and Housing Corporation.

Green, Christopher. 1980. Canadian Industrial Organization and Policy. Toronto: McGraw-Hill Ryerson.

Griliches, Zvi, ed. 1971a. Price Indexes and Quality Change. Cambridge, Massachusetts: Harvard University Press.

___. 1971b. "Introduction: Hedonic Price Indexes Revisited." In Price Indexes and Quality Change, edited by Zvi Griliches, 3-15. Cambridge, Massachusetts: Harvard University Press.

Hausman, Leonard J. 1972. Cumulative Tax Rates in Alternative Income Maintenance Systems. In U.S. Congress. Joint Economic Committee. Subcommittee on Fiscal Policy. Income Transfer Programs: How They Tax the Poor, 92-138. Studies in Public Welfare Paper, no. 4. Washington, D.C.: U.S. Government Printing Office.

Hayek, Friedrich A., et al. 1975. Rent Control: A Popular Paradox. Vancouver, British Columbia: Fraser Institute.

Howenstine, E. Jay. 1977. "European Experience with Rent Controls." Monthly Labor Review 100:1(June):21-28.

Kain, John F. 1969. An Alternative to Rent Control. Cambridge, Massachusetts: Harvard University Press.

Kain, John F., and Quigley, John M. 1975. Housing Markets and Racial Discrimination: A Microeconomic Analysis. Urban and Regional Studies, no. 3. New York: National Bureau of Economic Research.

Klein, William A., and Asimow, Michael R. 1970. "The Negative Income Tax: Accounting Problems and a Proposed Solution." Harvard Journal on Legislation 8(November):1-31.

Lamont, Donald H. L. 1983. Residential Tenancies. 4th ed. Toronto: Carswell.

Leigh, Wilhelmina A. 1981. "Comments [on Rossi paper]." In Do Housing Allowances Work?, edited by Katherine L. Bradbury and Anthony Downs, 172-183. Washington, D.C.: Brookings Institution.

Lett, Monica R. 1976a. Rent Control: Concepts, Realities, and Mechanisms. New Brunswick, New Jersey: Center for Urban Policy Research, Rutgers University.

Lett, Monica R. 1976b. "Rent Control: The Potential for Equity." American Real Estate and Urban Economics Association Journal 4:1(Spring):57-81.

Levy, F. 1976. How Big is the American Underclass? Washington, D.C.: U.S. Department of Labor.

Lipsey, Richard G.; Purvis, Douglas D.; Sparks, Gordon R.; and Steiner, Peter O. 1982. Economics. 4th ed. New York: Harper and Row.

Maass, Barbara Ellis. 1980. "The Theory and Practice of Conducting Local Housing Needs Studies: A Framework for the Assessment of Housing Need in Canadian Cities." Master's thesis, University of British Columbia.

MacMillan, James A., and Nickel, Edith. 1974. "An Economic Appraisal of Urban Housing Assistance: Rental Supplements versus Public Housing." Canadian Public Administration 17(Fall):443-460.

Marks, Denton. 1983. "Public Choice and Rent Control." Atlantic Economic Journal 11:3(September):63-69.

_____. 1984. "The Effect of Rent Control on the Price of Rental Housing: An Hedonic Approach." Land Economics 60:1(February):81-94.

_____. (forthcoming) "The Effects of Partial-coverage Rent Control on the Price and Quantity of Rental Housing." Journal of Urban Economics.

Miron, John R. 1979. On Household Groups and Housing Occupancy. Research Paper, no. 107. Toronto: Centre for Urban and Community Studies, University of Toronto.

Miron, John R., and Cullingworth, John Barry. 1983. Rent Control: Impacts on Income Distribution, Affordability and Security of Tenure. Toronto: Centre for Urban and Community Studies, University of Toronto.

Moffitt, Robert A., and Kehrer, Kenneth C. 1981. "The Effect of Tax and Transfer Programs on Labor Supply: The Evidence from the Income Maintenance Experiments." Research in Labor Economics 4:103-150.

Moorhouse, John C. 1972. "Optimal Housing Maintenance Under Rent Control." Southern Economic Journal 39:1(July):93-106.

Mosier, M. M., and Soble, R. A. 1973. "Modern Legislation, Metropolitan Court, Miniscule Results: A Study of Detroit's Landlord-Tenant Court." University of Michigan Journal of Law Reform 9:9-70.

Moynihan, Daniel P. 1973. The Politics of a Guaranteed Income: The Nixon Administration and the Family Assistance Plan. New York: Random House.

The Municipality of Metropolitan Toronto. Planning Department. 1980. Housing in Metropolitan Toronto: Affordable or Not? Report submitted to the Metropolitan Planning Committee Re: Housing Affordability. Toronto: Metropolitan Toronto Planning Department.

Okun, Arthur M. 1971. "The Personal Tax Surcharge and Consumer Demand." Brookings Papers on Economic Activity 1:167-204.

Olsen, Edgar O. 1972. "An Econometric Analysis of Rent Control." Journal of Political Economy 80:6(November-December):1081-1100.

Olson, Mancur. 1982. The Rise and Decline of Nations: Economic Growth, Stagflation, and Social Rigidities. New Haven: Yale University Press.

Ontario. Ministry of Municipal Affairs and Housing. 1982a. Socioeconomic Characteristics of Renters: October, 1980 Rental Market Survey Results. Toronto: Ministry of Municipal Affairs and Housing.

____. 1982b. The Impact of Rent Review on Rental Housing in Ontario: A Staff Research Report. Toronto: Ministry of Municipal Affairs and Housing.

____. 1982c. Rental Market Survey in Seven Ontario Cities, October 1981. Toronto: Ministry of Municipal Affairs and Housing.

____. 1983. Staff Report to Commission of Inquiry into Residential Tenancies. Toronto: Ministry of Municipal Affairs and Housing.

Orr, Larry L.; Hollister, Robinson, G.; and Lefcowitz, Myron J., eds. 1971. Income Maintenance: Interdisciplinary Approaches to Research. Chicago: Markham Publishing Company.

Oxford English Dictionary. 1971. Glasgow: Oxford University Press.

Pareto, Vilfredo. 1896. "Cours d'Economie Politique." In Sociological Writings, 97-122. Translated by Derick Mirfin and edited by S. E. Finer. London: Pall Mall Press, 1966.

Pechman, Joseph A., and Timpane, P. Michael, eds. 1975. Work Incentives and Income Guarantees: The New Jersey Negative Income Tax Experiment. Brookings Studies in Social Experimentation. Washington, D.C.: Brookings Institution.

Posner, Richard A. 1974. "Theories of Economic Regulation." Bell Journal of Economics and Management Science 5:2(Autumn):335-358.

Rea, Louis M., and Gupta, Dipak K. 1982. An Economic and Legal Analysis of Rent Control. San Diego: Institute of Public and Urban Affairs, San Diego State University.

Robinson, Ray V. H. 1979. Housing Economics and Public Policy. Studies in Planning. London: Macmillan.

Rossi, Peter H. 1981. "Residential Mobility." In Do Housing Allowances Work?, edited by Katherine L. Bradbury and Anthony Downs, 147-183. Washington, D.C.: Brookings Institution.

Samuelson, Paul A., and Scott, Anthony D. 1975. Economics. 4th ed. Toronto: McGraw-Hill Ryerson.

Seidel, Stephen R. 1978. Housing Costs and Government Regulations: Confronting the Regulatory Maze. New Brunswick, New Jersey: Center for Urban Policy Research, Rutgers University.

Shortell, Ann. 1981. "Builders Call for Rent Review Changes." Financial Post, 26 September 1981, p. S30.

Smith, Lawrence B., and Tomlinson, Peter. 1981. "Rent Controls in Ontario: Roofs or Ceilings." American Real Estate and Urban Economics Association Journal 9:2(Summer):93-114.

Social Planning Council of Metropolitan Toronto. 1983. Brief to the Commission of Inquiry into Residential Tenancies. Toronto: Social Planning Council of Metropolitan Toronto, February 1983.

The Social Planning Council of Oshawa-Whitby. 1981. A Profile of the Housing Affordability Crisis in Oshawa and Whitby. Prepared by Shirley Moore and Bev Fowler under the direction of the Housing Affordability Committee. Oshawa-Whitby: The Social Planning Council of Oshawa-Whitby.

Steele, Marion, and Miron, John. 1984. Rent Regulation, Housing Affordability Problems, and Market Imperfections. Research Study, no. 9. Toronto: Commission of Inquiry into Residential Tenancies.

Stegman, Michael A. 1982. The Dynamics of Rental Housing in New York City. Piscataway, New Jersey: Center for Urban Policy Research, Rutgers University.

Sternlieb, George. 1966. The Tenement Landlord. New Brunswick, New Jersey: Center for Urban Policy Research, Rutgers University Press.

Sternlieb, George, and Hughes, James W. 1979. "Rent Control's Impact on the Community Tax Base." The Appraisal Journal 47(July):381-394.

Stigler, George. 1971. "The Economic Theory of Regulation." Bell Journal of Economics and Management Science 8:1(Spring):30-21.

Struyk, Raymond J. 1981. "Policy Questions and Experimental Responses." In Housing Vouchers for the Poor: Lessons from a National Experiment, edited by Raymond J. Struyk and Marc Bendick, Jr., 320. Washington, D.C.: Urban Institute Press.

Struyk, Raymond J., and Bendick, Marc, Jr., eds. 1981. Housing Vouchers for the Poor: Lessons from a National Experiment. Washington, D.C.: Urban Institute Press.

Struyk, Raymond J.; Marshall, Sue A.; and Ozanne, Larry J. 1978. Housing Policies for the Urban Poor. Washington D.C.: Urban Institute Press.

"Study Finds Polluting More Profitable." The Globe and Mail (Toronto - Metro edition), 2 March 1984, p. B10.

Taggart, Robert, III. 1970. Low-Income Housing: A Critique of Federal Aid. Policy Studies in Employment and Welfare, no. 8. Baltimore: Johns Hopkins University Press.

U.S. President's Committee on Urban Housing. 1969. A Decent Home [Kaiser Report]. Washington, D.C.: U.S. Government Printing Office.

Whittingham, Anthony. 1978. "Rent Control or Not?" Financial Post, 4 February 1978, pp. 1, 4.

Wilson, James Q. 1974. "The Politics of Regulation." In Social Responsibility and the Business Predicament, edited by James W. McKie, 135-168. Washington, D.C.: Brookings Institution.

Wren, Christopher S. 1984. "The Chinese Revival in Free Enterprise: Taking Capitalism to the Streets." New York Times, 1 April 1984, v. 133, sec. 3, pp. F12-13.